

=> d his

(FILE 'HOME' ENTERED AT 09:34:53 ON 10 MAR 2003)  
SET COST OFF

FILE 'REGISTRY' ENTERED AT 09:35:04 ON 10 MAR 2003

E BETAINE/CN  
L1 1 S E3  
L2 3 S C5H12NO2/MF AND N N N TRIMETHYL AND CARBOX? AND METHANAMIN?  
L3 1 S L2 NOT (LABLED OR D/ELS)  
L4 2 S L1,L3  
E SILIBIN/CN  
L5 1 S E4  
E SILYMARIN/CN  
L6 7 S E3,E6,E8,E9,E10,E13,E15  
L7 6 S L6 NOT C4H6O4  
L8 6 S L5,L7  
L9 3 S (D-GLUCOSE OR L-GLUCOSE OR DL-GLUCOSE) /CN  
L10 14 S (D-FRUCTOSE OR L-FRUCTOSE OR DL-FRUCTOSE OR D-GALACTOSE OR L-  
L11 8 S (GLYCEROL OR LIPOIC ACID OR CITRIC ACID OR PHOSPHORIC ACID OR  
L12 3 S (D-METHIONINE OR L-METHIONINE OR DL-METHIONINE) /CN  
L13 1 S TOCOPHEROL/CN  
L14 1 S VITAMIN E/CN  
L15 9 S (SODIUM OR POTASSIUM OR CHLORINE OR PHOSPHORUS OR MAGNESIUM O  
E SODIUM, ION/CN  
L16 2 S E4,E170  
E POTASSIUM, ION/CN  
L17 2 S E6,E108  
E CHLORINE, ION/CN  
L18 4 S E9,E11,E20,E21  
E PHOSPHORUS, ION/CN  
L19 2 S E4,E25  
E MAGNESIUM, ION/CN  
L20 2 S E4,E29  
E ZINC, ION/CN  
L21 2 S E6,E19  
E CALCIUM, ION/CN  
L22 2 S E10,E23  
E IRON, ION/CN  
L23 2 S E6,E43  
E COPPER, ION/CN  
L24 2 S E7,E55

FILE 'HCAPLUS' ENTERED AT 09:49:25 ON 10 MAR 2003

L25 4700 S L4 OR L8  
E SILYMARIN  
L26 637 S E3-E5,E8  
L27 0 S SILY MARIN?  
L28 15024 S BETAINE  
L29 115 S FLAVONOLIGNAN?  
E LIGNANS/CT  
L30 42 S E4  
E E3+ALL  
L31 2724 S E2+NT  
L32 320 S LIGNAN(L) FLAVON?  
L33 19242 S L25-L32  
L34 794 S L33 AND CARBOHYDRATE?/SC, SX, CW, BI  
L35 316 S L33 AND (?OLIGOSACCHARIDE? OR ?POLYSACCHARIDE?)  
L36 399 S L33 AND ?SACCHARIDE?  
L37 324 S L33 AND L9  
L38 627 S L33 AND GLUCOSE  
L39 322 S L33 AND L10  
L40 483 S L33 AND (FRUCTOSE OR GALACTOSE OR MANNOSE OR RIBOSE OR INOSIT

Jan Delaval  
Reference Librarian  
Biotechnology & Chemical Library  
CM 1E07 - 703-308-4498  
jan.delaval@uspto.gov

L41 1795 S L34-L40  
 L42 359 S L41 AND L11  
 L43 90 S L41 AND L12  
 L44 43 S L41 AND L13, L14  
 L45 651 S L41 AND (GLYCEROL OR GLYCERIN# OR LIPOIC ACID OR CITRATE OR P  
 L46 687 S L42-L45  
 L47 96 S L46 AND L15-L24  
 L48 46 S L46 AND MINERAL  
 L49 450 S L46 AND (NA OR K OR CL OR P OR MG OR ZN OR CA OR FE OR CU OR  
 L50 454 S L47-L49  
 SAV L50 KWON770/A

=> fil hcaplus  
 FILE 'HCAPLUS' ENTERED AT 13:14:56 ON 10 MAR 2003  
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FILE COVERS 1907 - 10 Mar 2003 VOL 138 ISS 11  
 FILE LAST UPDATED: 9 Mar 2003 (20030309/ED)

This file contains CAS Registry Numbers for easy and accurate substance identification.

=> d 1114 all hitstr tot

L114 ANSWER 1 OF 12 HCAPLUS COPYRIGHT 2003 ACS  
 AN 2002:574972 HCAPLUS  
 DN 137:124619  
 TI Rehydration compositions containing electrolytes and nutrients  
 IN Hageman, Robert Johan Joseph; Verlaan, George;  
     Smeets, Rudolf Leonardus Lodewijk  
 PA Nutricia N.V., Neth.  
 SO PCT Int. Appl., 22 pp.  
     CODEN: PIXXD2  
 DT Patent  
 LA English  
 IC ICM A61P001-12  
     ICS A61K031-70; A61K031-35  
 CC 18-7 (Animal Nutrition)  
     Section cross-reference(s): 63  
 FAN.CNT 1

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	WO 2002058792	A2	20020801	WO 2002-NL63	20020128
	WO 2002058792	A3	20021121		

W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN,  
   CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH,  
   GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR,  
   LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH,

PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TN, TR, TT, TZ,  
 UA, UG, US, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU,  
 TJ, TM

RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, CH,  
 CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR,  
 BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG

US 2002176881 A1 20021128 US 2001-770773 20010126

PRAI US 2001-770773 A 20010126

AB The invention relates to a fluid that can be used for preventing or treating **hypohydration** and the secondary consequences thereof. The fluid comprises one or more **carbohydrates** and **minerals** and is further characterized by a low osmolarity. The invention further relates to the use of such a fluid for medical, dietetic and other applications. A **sportsdrink** contained **glucose** 8, **fructose** 6, **maltodextrin** 20, **glycerol** 1, **taurine** 1, **betaine** 1, **caffeine** 0.1, **sodium phosphate** 0.5, **sodium chloride** 0.1, and **potassium citrate** 0.3 g per serving 567 mL.

ST **rehydration drink** **saccharide** **electrolyte**  
**betaine** **nutrient**

IT **Cardiovascular system**  
 (disease; **rehydration drinks** contg. electrolytes and nutrients)

IT **Dairy products**  
 (drinks; **rehydration drinks** contg. electrolytes and nutrients)

IT **Aging, animal**  
 (elderly; **rehydration drinks** contg. electrolytes and nutrients)

IT **Drug delivery systems**  
 (enteric; **rehydration drinks** contg. electrolytes and nutrients)

IT **Lignans**  
 RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
 (flavonolignans; **rehydration drinks** contg. electrolytes and nutrients)

IT **Beverages**

Cystic fibrosis

Dehydration, physiological

Diarrhea

Exercise

Fruit and vegetable juices

Guarana (Paullinia cupana)

Intestine, disease

(**rehydration drinks** contg. electrolytes and nutrients)

IT **Betaines**

Carbohydrates, biological studies

Monosaccharides

Oligosaccharides, biological studies

Polysaccharides, biological studies

Tocopherols

Vitamins

RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(**rehydration drinks** contg. electrolytes and nutrients)

IT **Hydration, physiological**

(**rehydration**; **rehydration drinks** contg. electrolytes and nutrients)

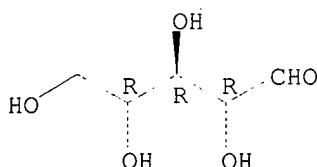
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studies 57-48-7, D-Fructose, biological studies 58-08-2, Caffeine, biological studies 59-23-4, D-Galactose, biological studies 63-68-3, L-Methionine, biological studies 77-92-9, Citric acid, biological studies 87-89-8, Inositol 107-35-7, Taurine 869-06-7, Magnesium malate 3458-28-4, D-Mannose 6915-15-7, Malic acid 7632-05-5, Sodium phosphate 7647-14-5, Sodium chloride, biological studies 7664-38-2, Phosphoric acid, biological studies 7778-49-6, Potassium citrate 9050-36-6, Maltodextrin 17482-42-7, Calcium malate 22888-70-6 57828-26-9, Lipoic acid 65666-07-1, Silymarin  
RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
(rehydration drinks contg. electrolytes and nutrients)

IT 50-69-1, D-Ribose 50-99-7, D-Glucose  
, biological studies 56-81-5, Glycerol, biological studies 57-48-7, D-Fructose, biological studies 58-08-2, Caffeine, biological studies 59-23-4, D-Galactose, biological studies 63-68-3, L-Methionine, biological studies 77-92-9, Citric acid, biological studies 87-89-8, Inositol 107-35-7, Taurine 3458-28-4, D-Mannose 6915-15-7, Malic acid 7664-38-2, Phosphoric acid, biological studies 22888-70-6 57828-26-9, Lipoic acid 65666-07-1, Silymarin  
RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
(rehydration drinks contg. electrolytes and nutrients)

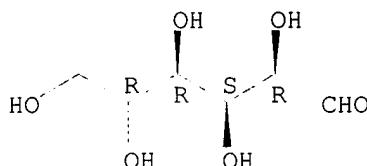
RN 50-69-1 HCPLUS  
CN D-Ribose (9CI) (CA INDEX NAME)

Absolute stereochemistry.

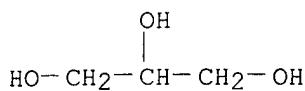


RN 50-99-7 HCPLUS  
CN D-Glucose (8CI, 9CI) (CA INDEX NAME)

Absolute stereochemistry.

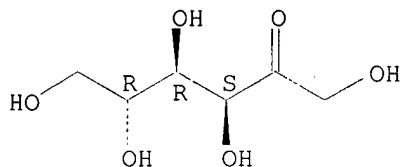


RN 56-81-5 HCPLUS  
CN 1,2,3-Propanetriol (9CI) (CA INDEX NAME)

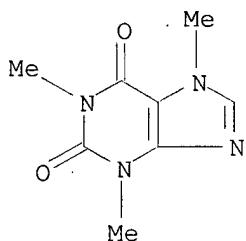


RN 57-48-7 HCAPLUS  
 CN D-Fructose (9CI) (CA INDEX NAME)

Absolute stereochemistry.

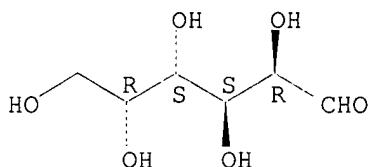


RN 58-08-2 HCAPLUS  
 CN 1H-Purine-2,6-dione, 3,7-dihydro-1,3,7-trimethyl- (9CI) (CA INDEX NAME)



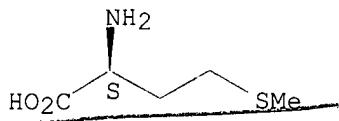
RN 59-23-4 HCAPLUS  
 CN D-Galactose (9CI) (CA INDEX NAME)

Absolute stereochemistry. Rotation (+).

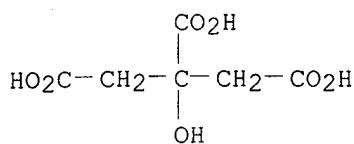


RN 63-68-3 HCAPLUS  
 CN L-Methionine (9CI) (CA INDEX NAME)

Absolute stereochemistry.

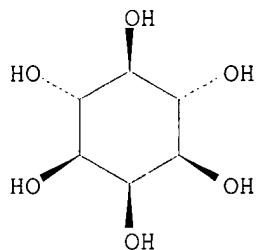


RN 77-92-9 HCAPLUS  
 CN 1,2,3-Propanetricarboxylic acid, 2-hydroxy- (9CI) (CA INDEX NAME)

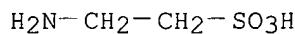


RN 87-89-8 HCAPLUS  
 CN myo-Inositol (9CI) (CA INDEX NAME)

Relative stereochemistry.

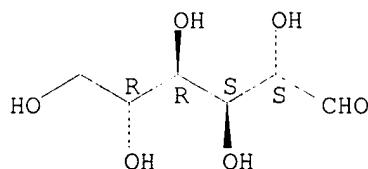


RN 107-35-7 HCAPLUS  
 CN Ethanesulfonic acid, 2-amino- (9CI) (CA INDEX NAME)

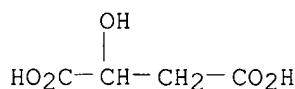


RN 3458-28-4 HCAPLUS  
 CN D-Mannose (9CI) (CA INDEX NAME)

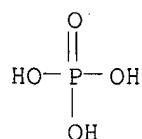
Absolute stereochemistry. Rotation (+).



RN 6915-15-7 HCAPLUS  
 CN Butanedioic acid, hydroxy- (9CI) (CA INDEX NAME)



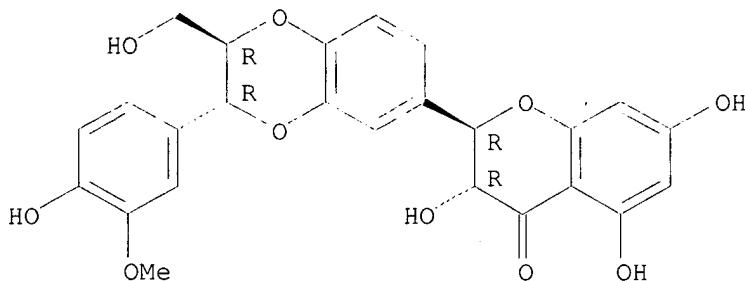
RN 7664-38-2 HCAPLUS  
 CN Phosphoric acid (7CI, 8CI, 9CI) (CA INDEX NAME)



RN 22888-70-6 HCAPLUS

CN 4H-1-Benzopyran-4-one, 2-[(2R,3R)-2,3-dihydro-3-(4-hydroxy-3-methoxyphenyl)-2-(hydroxymethyl)-1,4-benzodioxin-6-yl]-2,3-dihydro-3,5,7-trihydroxy-, (2R,3R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry. Rotation (+).



RN 57828-26-9 HCAPLUS

CN Lipoic acid (9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*

RN 65666-07-1 HCAPLUS

CN Silymarin (9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*

L114 ANSWER 2 OF 12 HCAPLUS COPYRIGHT 2003 ACS

AN 2002:465733 HCAPLUS

DN 137:37656

TI Health promoting composition containing vitamins

IN Clayton, Paul

PA Aventis Pharma Deutschland G.m.b.H., Germany

SO PCT Int. Appl., 43 pp.

CODEN: PIXXD2

DT Patent

LA English

IC ICM A23L001-30

CC 63-6 (Pharmaceuticals)

Section cross-reference(s): 17

FAN.CNT 2

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	WO 2002047493	A2	20020620	WO 2001-EP14260	20011205
	WO 2002047493	A3	20021017		
	W:	AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM, RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG			
	EP 1214893	A1	20020619	EP 2000-127644	20001216
	R:	AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR			
	DE 10109798	A1	20020912	DE 2001-10109798	20010301
	AU 2002021934	A5	20020624	AU 2002-21934	20011205
PRAI	EP 2000-127644	A	20001216		
	DE 2001-10109798	A	20010301		

WO 2001-EP14260 W 20011205

AB The invention refers to several compns. promoting human **health** comprising one or several but no all of the following compds. a) 800 mcg (2664IU) of **vitamin A**, 500 **mg** of **vitamin C**, 15 mcg of **vitamin D**, 265 **mg** (400IU) of **vitamin E**, 50 mcg of **vitamin K**, b) 10 **mg** of **.beta.-carotene**, 6 **mg** of **lutein**, 5mg of **lycopene**, 100 mcg of **zeaxanthin**, c) 7.5 **mg** of **vitamin B1**, 7.5 **mg** of **vitamin B2**, 15 **mg** of **niacin**, 15 **mg** of **pantothenic acid**, 7.5 **mg** of **vitamin B6**, 200 mcg of **folic acid**, 6.75 mcg of **vitamin B12**, d) 150 mcg of **selenium**, 10 **mg** of **zinc**, 100 **mg** of **calcium**, 50 **mg** of **magnesium**, 120 mcg of **chromium**, 2 **mg** of **copper**, 4 **mg** of **manganese**, 100 mcg of **iodine**, 100 mcg of **molybdenum**, e) 200 mcg of **biotin**, 450 **mg** of **betaine**, 100 **mg** of **oligoproanthocyanidins (OPC)**, 150 **mg** of **Polyphenol complex**, 40 **mg** of **Isoflavones** in particular **genistein** and/or **daidzein**, 600 **mg** of **Omega 3**, 4 g of **Oligosaccharides (FOS)** in particular **inulin**, and/or **oligo-fructose** and/or **beta glucan**, 30-60 **mg** of **Co-Q10**, f) 500 **mg** of **glucosamine** and possibly addnl. substances for the purpose of stabilization and formulation.

ST **health** promoting compn **vitamin**

IT Antiasthmatics

Antidiabetic agents

Mental disorder

(**health** promoting compn. contg. **vitamins**)

IT **Oligosaccharides**, biological studies

**Vitamins**

RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(**health** promoting compn. contg. **vitamins**)

IT Flavones

RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(**isoflavones**; **health** promoting compn. contg. **vitamins**)

IT Proanthocyanidins

RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(**polymers**; **health** promoting compn. contg. **vitamins**)

IT Phenols, biological studies

RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(**polyphenols**, **nonpolymeric**; **health** promoting compn. contg. **vitamins**)

IT Fatty acids, biological studies

RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(**polyunsatd.**, **n-3**; **health** promoting compn. contg. **vitamins**)

IT Fatty acids, biological studies

RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(**polyunsatd.**, **omega-6**; **health** promoting compn. contg. **vitamins**)

IT Diet

(**supplements**; **health** promoting compn. contg. **vitamins**)

IT 50-81-7, **Vitamin c**, biological studies 58-85-5, Biotin 59-30-3, Folic acid, biological studies 59-43-8, **Vitamin b1**, biological studies 59-67-6, Niacin, biological studies 68-19-9, **Vitamin b12**

79-83-4, Pantothenic acid 83-88-5, Vitamin b2, biological studies 107-43-7, **Betaine** 127-40-2, Lutein 144-68-3, Zeaxanthin 303-98-0, Coenzyme q10 446-72-0, Genistein 486-66-8, Daidzein 502-65-8, Lycopene 1406-18-4, **Vitamin e** 3416-24-8, D-Glucosamine 7235-40-7, .beta.-Carotene 7439-96-5, Manganese, biological studies 7439-98-7, Molybdenum, biological studies 7440-47-3, Chromium, biological studies 7440-50-8, **Copper**, biological studies 7440-66-6, **Zinc**, biological studies 7553-56-2, Iodine, biological studies 7782-49-2, Selenium, biological studies 8059-24-3, **Vitamin b6** 9041-22-9, .beta.-Glucan 11103-57-4, **Vitamin a** 12001-79-5, **Vitamin k** 25702-76-5, Polyfructose  
 RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(health promoting compn. contg. vitamins)

IT 50-81-7, **Vitamin c**, biological studies 58-85-5, Biotin 59-30-3, Folic acid, biological studies 59-43-8, **Vitamin b1**, biological studies 59-67-6, Niacin, biological studies 68-19-9, **Vitamin b12** 79-83-4, Pantothenic acid 83-88-5, **Vitamin b2**, biological studies 107-43-7, **Betaine** 127-40-2, Lutein 144-68-3, Zeaxanthin 303-98-0, Coenzyme q10 446-72-0, Genistein 486-66-8, Daidzein 502-65-8, Lycopene 1406-18-4, **Vitamin e** 3416-24-8, D-Glucosamine 7235-40-7, .beta.-Carotene 7439-96-5, Manganese, biological studies 7439-98-7, Molybdenum, biological studies 7440-47-3, Chromium, biological studies 7440-50-8, **Copper**, biological studies 7440-66-6, **Zinc**, biological studies 7553-56-2, Iodine, biological studies 7782-49-2, Selenium, biological studies 8059-24-3, **Vitamin b6** 9041-22-9, .beta.-Glucan 11103-57-4, **Vitamin a** 12001-79-5, **Vitamin k** 25702-76-5, Polyfructose  
 RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

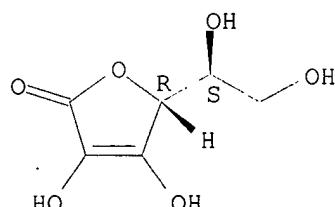
(health promoting compn. contg. vitamins)

IT 50-81-7, **Vitamin c**, biological studies 59-30-3, Folic acid, biological studies 59-43-8, **Vitamin b1**, biological studies 59-67-6, Niacin, biological studies 68-19-9, **Vitamin b12** 79-83-4, Pantothenic acid 83-88-5, **Vitamin b2**, biological studies 107-43-7, **Betaine** 1406-18-4, **Vitamin e** 7440-50-8, **Copper**, biological studies 7440-66-6, **Zinc**, biological studies 8059-24-3, **Vitamin b6** 11103-57-4, **Vitamin a** 12001-79-5, **Vitamin k**  
 RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(health promoting compn. contg. vitamins)

RN 50-81-7 HCPLUS  
 CN L-Ascorbic acid (8CI, 9CI) (CA INDEX NAME)

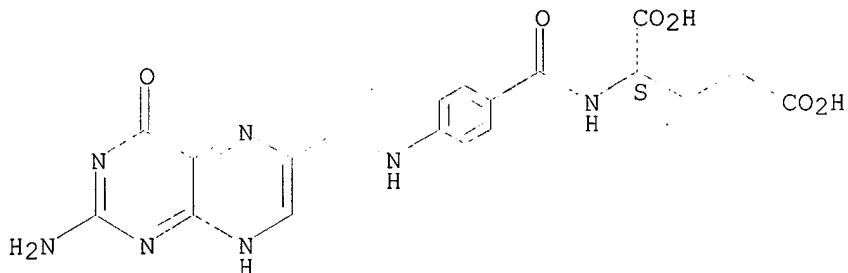
Absolute stereochemistry.



RN 59-30-3. HCPLUS

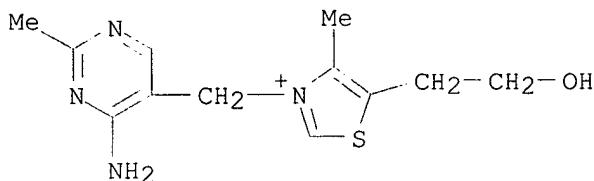
CN L-Glutamic acid, N-[4-[(2-amino-1,4-dihydro-4-oxo-6-pteridinyl)methyl]amino]benzoyl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



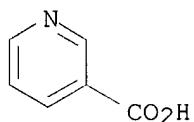
RN 59-43-8 HCPLUS

CN Thiazolium, 3-[(4-amino-2-methyl-5-pyrimidinyl)methyl]-5-(2-hydroxyethyl)-4-methyl- chloride (9CI) (CA INDEX NAME)

● Cl<sup>-</sup>

RN 59-67-6 HCPLUS

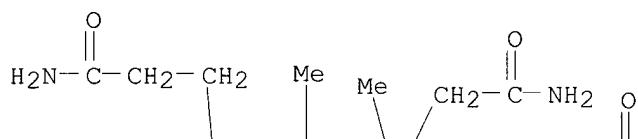
CN 3-Pyridinecarboxylic acid (9CI) (CA INDEX NAME)



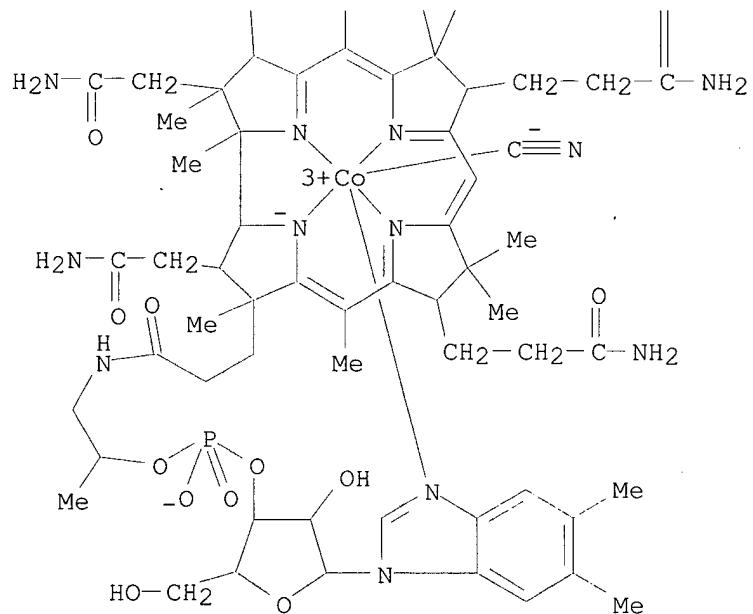
RN 68-19-9 HCPLUS

CN Vitamin B12 (8CI, 9CI) (CA INDEX NAME)

PAGE 1-A

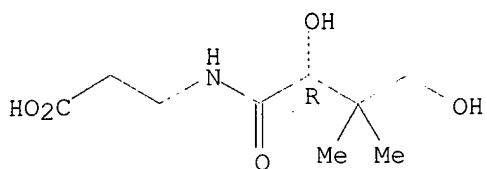


PAGE 2-A



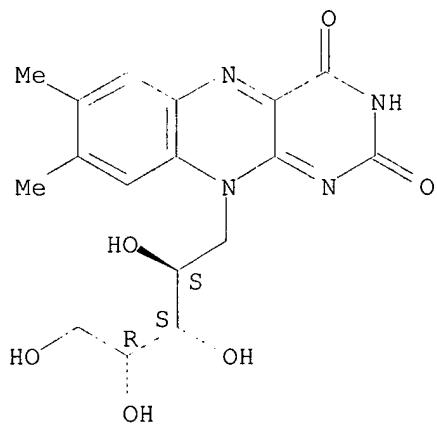
RN 79-83-4 HCAPLUS  
CN .beta.-Alanine, N-[(2R)-2,4-dihydroxy-3,3-dimethyl-1-oxobutyl]- (9CI) (CA  
INDEX NAME)

Absolute stereochemistry. Rotation (+).



RN 83-88-5 HCAPLUS  
 CN Riboflavin (8CI, 9CI) (CA INDEX NAME)

Absolute stereochemistry.



RN 107-43-7 HCAPLUS  
 CN Methanaminium, 1-carboxy-N,N,N-trimethyl-, inner salt (9CI) (CA INDEX NAME)

$\text{Me}_3\text{N}^+ - \text{CH}_2 - \text{CO}_2^-$

RN 1406-18-4 HCAPLUS  
 CN Vitamin E (9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*  
 RN 7440-50-8 HCAPLUS  
 CN Copper (7CI, 8CI, 9CI) (CA INDEX NAME)

Cu

RN 7440-66-6 HCAPLUS  
 CN Zinc (7CI, 8CI, 9CI) (CA INDEX NAME)

Zn

RN 8059-24-3 HCAPLUS  
 CN Vitamin B6 (8CI, 9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*  
 RN 11103-57-4 HCAPLUS  
 CN Vitamin A (9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*

RN 12001-79-5 HCAPLUS  
CN Vitamin K (8CI, 9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*

L114 ANSWER 3 OF 12 HCAPLUS COPYRIGHT 2003 ACS

AN 2002:462447 HCAPLUS

DN 137:11020

TI Health promoting compositions

IN Clayton, Paul

PA Aventis Pharma Deutschland G.m.b.H., Germany

SO Eur. Pat. Appl., 18 pp.

CODEN: EPXXDW

DT Patent

LA English

IC ICM A23L001-30

ICS A61K035-78

CC 63-6 (Pharmaceuticals)

Section cross-reference(s): 18

FAN.CNT 2

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	EP 1214893	A1	20020619	EP 2000-127644	20001216
	R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR				
	WO 2002047493	A2	20020620	WO 2001-EP14260	20011205
	WO 2002047493	A3	20021017		
	W: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, OM, PH, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, UZ, VN, YU, ZA, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
	RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG				
	AU 2002021934	A5	20020624	AU 2002-21934	20011205
	US 2002146463	A1	20021010	US 2001-14488	20011214
PRAI	EP 2000-127644	A	20001216		
	DE 2001-10109798	A	20010301		
	WO 2001-EP14260	W	20011205		

AB The invention refers to several compns. promoting human **health** comprising one or several but not all of the following compds.: (a) 800 mcg (2664 IU) of **vitamin A**, 500 mg of **vitamin C**, 15 mcg of **vitamin D**, 265 mg (400 IU) of **vitamin E**, 50 mcg of **vitamin K**, (b) 10 mg of **.beta.-carotene**, 6 mg of **lutein**, 5 mg of **lycopene**, 100 mcg of **zeaxanthin**, (c) 7.5 mg of **vitamin B1**, 7.5 mg of **vitamin B2**, 15 mg of **niacin**, 15 mg of **pantothenic acid**, 7.5 mg of **vitamin B6**, 200 mcg of **folic acid**, 6.75 mcg of **vitamin B12**, (d) 150 mcg of **selenium**, 10 mg of **Zn**, 100 mg of **Ca**, 50 mg of **Mg**, 120 mcg of **Cr**, 2 mg of **Cu**, 4 mg of **Mn**, 100 mcg of **I**, 100 mcg of **molybdenum**, (e) 200 mcg of **biotin**, 450 mg of **betaine**, 100 mg of **oligoproanthocyanidins**, 150 mg of **polyphenol complex**, 40 mg of **isoflavones** in particular **genistein** and/or **daidzein**, 600 mg of **omega 3 and 6**, 4 g of **oligosaccharides** in particular **inulin**, and/or **oligo-fructose** and/or **beta glucan**, 30-60 mg of **Co-Q10**, (f) 500 mg of **glucosamine**, and

possibly substances for the purpose of stabilization and formulation.  
ST health promoting compn **vitamin** trace element  
IT **Oligosaccharides**, biological studies  
    **Vitamins**  
    RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
        (**health** promoting compns. contg.)  
IT Drug delivery systems  
    (**health** promoting compns. in)  
IT Proanthocyanidins  
RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
    (oligo-; **health** promoting compns. contg.)  
IT Phenols, biological studies  
RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
    (polyphenols, nonpolymeric; **health** promoting compns. contg.)  
IT 50-81-7, **Vitamin C**, biological studies 57-48-7D  
    , **Fructose**, oligo- 58-85-5, **Biotin** 59-30-3, **Folic acid**, biological studies 59-43-8, **Vitamin B1**, biological studies 59-67-6, **Niacin**, biological studies 68-19-9, **Vitamin B12** 83-88-5, **Vitamin B2**, biological studies 107-43-7, **Betaine** 127-40-2, **Lutein** 144-68-3, **Zeaxanthin** 486-66-8, **Daidzein** 502-65-8, **Lycopene** 1406-16-2, **Vitamin D** 1406-18-4, **Vitamin E** 7235-40-7, **.beta.-Carotene** 7439-95-4  
    , **Magnesium**, biological studies 7439-96-5, **Manganese**, biological studies 7439-98-7, **Molybdenum**, biological studies 7440-47-3, **Chromium**, biological studies 7440-50-8, **Copper**, biological studies 7440-66-6, **Zinc**, biological studies 7440-70-2, **Calcium**, biological studies 7553-56-2, **Iodine**, biological studies 7782-49-2, **Selenium**, biological studies 8059-24-3, **Vitamin B6** 9005-80-5, **Inulin** 9041-22-9, **.beta.-Glucan** 11103-57-4, **Vitamin A** 12001-79-5, **Vitamin K**  
    RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
        (**health** promoting compns. contg.)

RE.CNT 4 THERE ARE 4 CITED REFERENCES AVAILABLE FOR THIS RECORD

RE

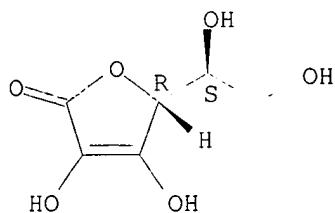
- (1) Kosbab, J; WO 9833494 A 1998 HCPLUS
- (2) Melegari, P; WO 0053176 A 2000 HCPLUS
- (3) Rodney, C; WO 9900135 A 1999 HCPLUS
- (4) Walsh Leo; US 6139872 A 2000 HCPLUS

IT 50-81-7, **Vitamin C**, biological studies 57-48-7D  
    , **Fructose**, oligo- 59-30-3, **Folic acid**, biological studies 59-43-8, **Vitamin B1**, biological studies 59-67-6, **Niacin**, biological studies 68-19-9, **Vitamin B12** 83-88-5, **Vitamin B2**, biological studies 107-43-7, **Betaine** 1406-16-2, **Vitamin D** 1406-18-4, **Vitamin E** 7439-95-4, **Magnesium**, biological studies 7440-50-8, **Copper**, biological studies 7440-66-6  
    , **Zinc**, biological studies 7440-70-2, **Calcium**, biological studies 8059-24-3, **Vitamin B6** 9005-80-5  
    11103-57-4, **Vitamin A** 12001-79-5, **Vitamin K**  
    RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
        (**health** promoting compns. contg.)

RN 50-81-7 HCPLUS

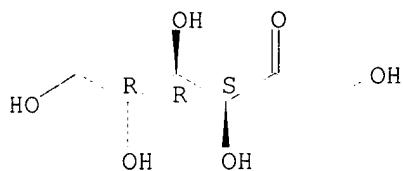
CN L-Ascorbic acid (8CI, 9CI) (CA INDEX NAME)

Absolute stereochemistry.



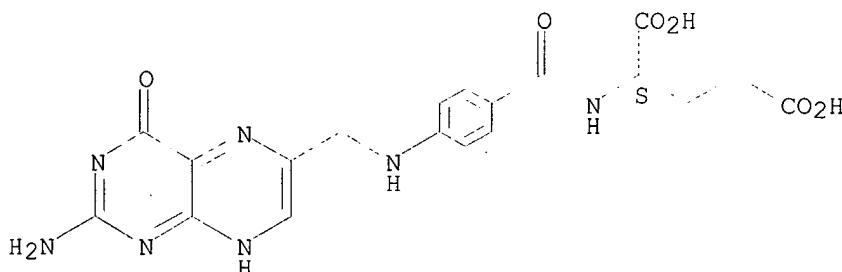
RN 57-48-7 HCAPLUS  
 CN D-Fructose (9CI) (CA INDEX NAME)

Absolute stereochemistry.

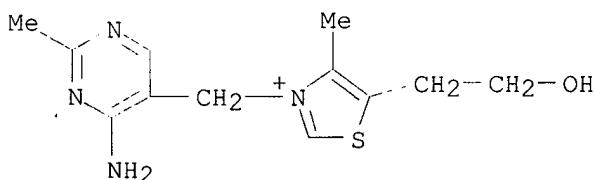


RN 59-30-3 HCAPLUS  
 CN L-Glutamic acid, N-[4-[(2-amino-1,4-dihydro-4-oxo-6-pteridinyl)methyl]amino]benzoyl] (9CI) (CA INDEX NAME)

Absolute stereochemistry.

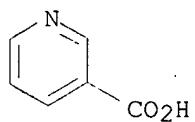


RN 59-43-8 HCAPLUS  
 CN Thiazolium, 3-[(4-amino-2-methyl-5-pyrimidinyl)methyl]-5-(2-hydroxyethyl)-4-methyl- chloride (9CI) (CA INDEX NAME)



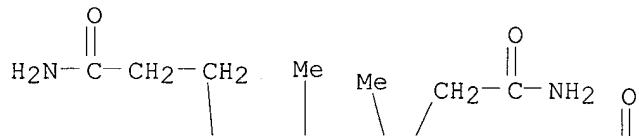
Cl-

RN 59-67-6 HCAPLUS  
 CN 3-Pyridinecarboxylic acid (9CI) (CA INDEX NAME)

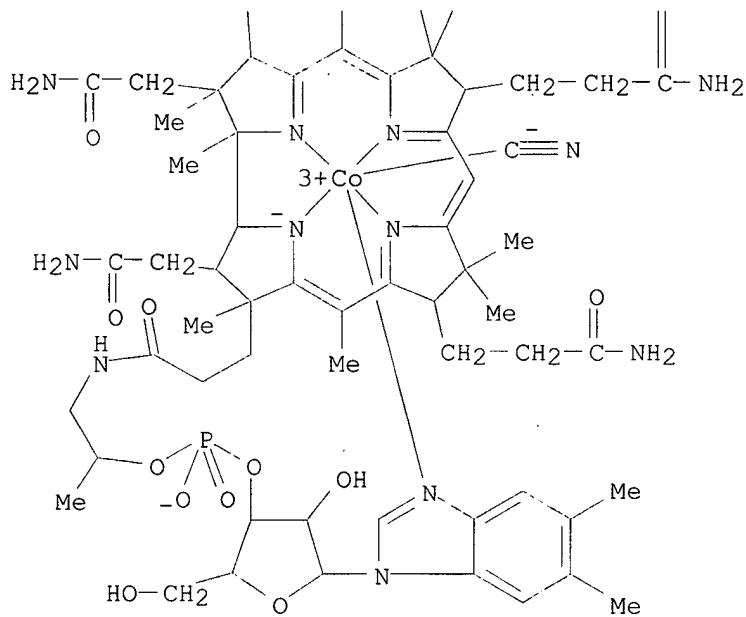


RN 68-19-9 HCPLUS  
CN Vitamin B12 (8CI, 9CI) (CA INDEX NAME)

PAGE 1-A

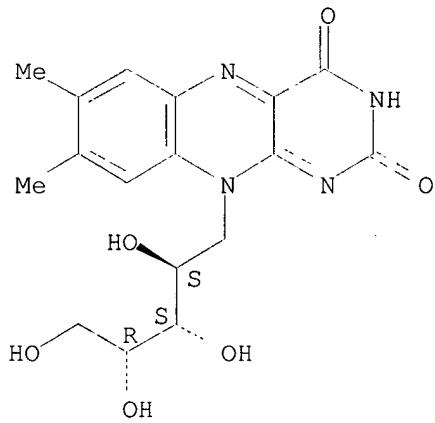


PAGE 2-A

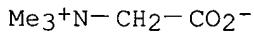


RN 83-88-5 HCAPLUS  
 CN Riboflavin (8CI, 9CI) (CA INDEX NAME)

Absolute stereochemistry.



RN 107-43-7 HCAPLUS  
 CN Methanaminium, 1-carboxy-N,N,N-trimethyl-, inner salt (9CI) (CA INDEX NAME)



RN 1406-16-2 HCAPLUS  
 CN Vitamin D (8CI, 9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*  
 RN 1406-18-4 HCAPLUS  
 CN Vitamin E (9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*

RN 7439-95-4 HCAPLUS  
 CN Magnesium (8CI, 9CI) (CA INDEX NAME)

Mg

RN 7440-50-8 HCAPLUS  
 CN Copper (7CI, 8CI, 9CI) (CA INDEX NAME)

Cu

RN 7440-66-6 HCAPLUS  
 CN Zinc (7CI, 8CI, 9CI) (CA INDEX NAME)

Zn

RN 7440-70-2 HCAPLUS  
 CN Calcium (8CI, 9CI) (CA INDEX NAME)

Ca

RN 8059-24-3 HCAPLUS  
 CN Vitamin B6 (8CI, 9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*

RN 11103-57-4 HCAPLUS  
 CN Vitamin A (9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*

RN 12001-79-5 HCAPLUS  
 CN Vitamin K (8CI, 9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*

L114 ANSWER 4 OF 12 HCAPLUS COPYRIGHT 2003 ACS  
 AN 2002:271056 HCAPLUS  
 DN 136:299719  
 TI **Dietary supplement for promoting healthy hormonal balance**  
 IN Hastings, Carl W.; Barnes, David J.; Daley, Christine A.  
 PA Reliv' International, Inc., USA  
 SO U.S., 5 pp.  
 CODEN: USXXAM  
 DT Patent  
 LA English  
 IC ICM A61K009-14  
 ICS A61K047-28; A61K031-56  
 NCL 424439000  
 CC 63-6 (Pharmaceuticals)  
 Section cross-reference(s): 1, 2, 18

FAN.CNT 1

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI US 6368617	B1	20020409	US 2001-858047	20010515
PRAI US 2001-858047		20010515		

AB A dietary supplement for promoting **healthy** hormonal balance in adult human subjects, and esp. in elderly subjects, comprises a secretagogue for stimulating the release of human growth hormone (hGH) by the pituitary, and the conversion by hGH to insulin-like growth factor 1 (IGF-1), in combination with 7-keto-dehydroepiandrosterone (7-keto DHEA). The dietary supplement also includes other interacting ingredients for delivering antioxidants for retarding damage at the cellular level caused by the presence of free radicals, and natural herbs for promoting physiol. **health**. For example, an essentially dry powder constituting a dietary supplement of this invention, to be dissolved in water to provide a daily serving, contained 7-keto-DHEA 25 **mg**, Symbiotropin 1000 **mg**, lecithin 200 **mg**, maltodextrin 7.227 **mg**, citric acid 640 **mg**, dipotassium phosphate 25 **mg**, potassium citrate 25 **mg**, probiotic blend 100 **mg**, fruco-oligosaccharides 400 **mg**, S-adenosyl-L-methionine 5 **mg**, acetyl-L-carnitine 100 **mg**, omega-3 fatty acids (Dry n-3) 125 **mg**, trimethylglycine 100 **mg**, coenzyme Q10 7.5 **mg**, resveratrol (Protylekin) 10 **mg**, alpha-lipoic acid 50 **mg**, L-glutathione 30 **mg**, N-acetylcysteine 200 **mg**, and flavoring agents 300 **mg**.

ST ketodehydroepiandrosterone growth hormone secretagogue oral dietary supplement aging

IT Aging, animal  
Antioxidants

**Beverages**

Bifidobacterium bifidum

Ginkgo

Human

Lactobacillus acidophilus

Spirulina

Spirulina platensis

Yam (Dioscorea villosa)

(dietary supplement for stimulating release of human growth hormone and promoting **healthy** hormonal balance in humans)

IT Hormones, animal, biological studies

RL: BSU (Biological study, unclassified); BIOL (Biological study)

(dietary supplement for stimulating release of human growth hormone and promoting **healthy** hormonal balance in humans)

IT **Carbohydrates**, biological studies

RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(dietary supplement for stimulating release of human growth hormone and promoting **healthy** hormonal balance in humans)

IT **Fructooligosaccharides**

RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(dietary supplement for stimulating release of human growth hormone and promoting **healthy** hormonal balance in humans)

IT Aging, animal

(elderly; dietary supplement for stimulating release of human growth hormone and promoting **healthy** hormonal balance in humans)

IT Amino acids, biological studies

RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(glyco-; dietary supplement for stimulating release of human growth hormone and promoting **healthy** hormonal balance in humans)

IT Nettle

(leaf powder; dietary supplement for stimulating release of human growth hormone and promoting **healthy** hormonal balance in humans)

IT Ginkgo biloba

(leaf power; dietary supplement for stimulating release of human growth hormone and promoting **healthy** hormonal balance in humans)

IT **Embryophyta**

(medicinal plant, exts.; dietary supplement for stimulating release of

human growth hormone and promoting **healthy** hormonal balance in humans)

IT Drug delivery systems  
(oral; dietary supplement for stimulating release of human growth hormone and promoting **healthy** hormonal balance in humans)

IT Fatty acids, biological studies  
RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
(polyunsatd., n-3; dietary supplement for stimulating release of human growth hormone and promoting **healthy** hormonal balance in humans)

IT Chlorella  
(powder; dietary supplement for stimulating release of human growth hormone and promoting **healthy** hormonal balance in humans)

IT Drug delivery systems  
(powders; dietary supplement for stimulating release of human growth hormone and promoting **healthy** hormonal balance in humans)

IT Intestinal bacteria  
(probiotic, blends; dietary supplement for stimulating release of human growth hormone and promoting **healthy** hormonal balance in humans)

IT Yam (Dioscorea)  
(root powder; dietary supplement for stimulating release of human growth hormone and promoting **healthy** hormonal balance in humans)

IT Pituitary gland  
(secretagogues; dietary supplement for stimulating release of human growth hormone and promoting **healthy** hormonal balance in humans)

IT Diet  
(supplements; dietary supplement for stimulating release of human growth hormone and promoting **healthy** hormonal balance in humans)

IT Lepidium meyenii  
(tuber powder; dietary supplement for stimulating release of human growth hormone and promoting **healthy** hormonal balance in humans)

IT 56-12-2D, .gamma.-Aminobutyric acid, glyco derivs. 56-40-6D, Glycine, glyco derivs. 56-85-9D, L-Glutamine, glyco derivs. 70-18-8, L-Glutathione, biological studies 107-43-7, Trimethylglycine 303-98-0, Coenzyme Q10 501-36-0, Resveratrol 518-82-1, Emodin 520-27-4, Diosmin 566-19-8 616-91-1, N-Acetylcysteine 657-27-2D, L-Lysine monohydrochloride, glyco derivs. 1200-22-2, .alpha.-Lipoic acid 3040-38-8, Acetyl-L-carnitine 6151-25-3, Quercetin dihydrate 28319-77-9, L-.alpha.-Glycerylphosphorylcholine 29908-03-0, S-Adenosyl-L-**methionine** 56265-06-6D, glyco derivs. 408496-12-8, Symbiotropin  
RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
(dietary supplement for stimulating release of human growth hormone and promoting **healthy** hormonal balance in humans)

IT 59-92-7, biological studies  
RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
(plant-derived source of; dietary supplement for stimulating release of human growth hormone and promoting **healthy** hormonal balance in humans)

IT 9004-10-8, Insulin, biological studies 67763-96-6, Insulin-like growth factor 1  
RL: BSU (Biological study, unclassified); BIOL (Biological study)  
(regulators; dietary supplement for stimulating release of human growth hormone and promoting **healthy** hormonal balance in humans)

IT 9004-10-8, Insulin, biological studies 67763-96-6, Insulin-like growth factor 1  
RL: BSU (Biological study, unclassified); BIOL (Biological study)  
(regulators; dietary supplement for stimulating release of human growth

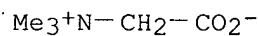
hormone and promoting **healthy** hormonal balance in humans)  
 RE.CNT 6 THERE ARE 6 CITED REFERENCES AVAILABLE FOR THIS RECORD  
 RE

- (1) Cochran; US 6048846 A 2000 HCPLUS
- (2) Jamieson, J; The Role of Somatotroph-Specific Peptides and IGF-1 Intermediates as an Alternative to High Injections, 1997
- (3) Lardy; US 5292730 A 1994 HCPLUS
- (4) Lardy; US 5585371 A 1996 HCPLUS
- (5) Lardy; US 5641766 A 1997 HCPLUS
- (6) Partridge; US 5296481 A 1994 HCPLUS

IT 107-43-7, Trimethylglycine 1200-22-2, .alpha.-Lipoic acid  
 RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
 (dietary supplement for stimulating release of human growth hormone and promoting **healthy** hormonal balance in humans)

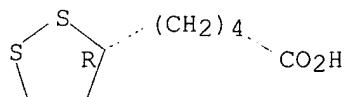
RN 107-43-7 HCPLUS

CN Methanaminium, 1-carboxy-N,N,N-trimethyl-, inner salt (9CI) (CA INDEX NAME)



RN 1200-22-2 HCPLUS  
 CN 1,2-Dithiolane-3-pentanoic acid, (3R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry. Rotation (+).



L114 ANSWER 5 OF 12 HCPLUS COPYRIGHT 2003 ACS  
 AN 2002:10980 HCPLUS  
 DN 136:74665  
 TI Nutritional system for nervous system disorders  
 IN Foreman, David J.  
 PA USA  
 SO U.S. Pat. Appl. Publ., 6 pp.  
 CODEN: USXXCO  
 DT Patent  
 LA English  
 IC ICM A61K045-00  
 ICS A61K031-715; A61K035-80; A61K035-78  
 NCL 424093300  
 CC 63-6 (Pharmaceuticals)  
 Section cross-reference(s): 17

FAN.CNT 1

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
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PI US 2002001575	A1	20020103	US 2001-865040	20010524
PRAI US 2000-207665P	P	20000526		

AB A novel compn. for treating nervous system disorders. The compn. is formed by prep. a mixt. comprising an effective amt. of **vitamin B-6**, **folic acid**, **vitamin C**, **magnesium**, **vitamin B-3**, **copper**, probiotics, fructo-oligosaccharide (FOS), **betaine**, **pancreatin**, **papain**, **pepsin**, **vitamin B-1**, **vitamin B-2**, **vitamin B-12**, **biotin**, **pantothenic acid**, **chromium polynicotinate** and a digestive support ingredient selected from the group consisting of **dandelion root**, **juniper**, **aloe vera**, **burdock**,

ginger root, artichoke, and kelp. Other ingredients may include: beta carotene, **vitamin E**, selenium, zinc, sea vegetation, alfalfa, trace **minerals** and molybdenum.

ST nutrient soln nervous system disorder

IT Ginseng (Panax)  
(Siberian; **nutritional system** for nervous system disorders)

IT Barberry (Berberis)  
Elm (Ulmus)  
(bark; **nutritional system** for nervous system disorders)

IT Caulophyllum thalictroides  
(blue cohosh; **nutritional system** for nervous system disorders)

IT Eupatorium perfoliatum  
(boneset; **nutritional system** for nervous system disorders)

IT Nervous system  
(disease; **nutritional system** for nervous system disorders)

IT Rose (Rosa)  
(hips; **nutritional system** for nervous system disorders)

IT **Alfalfa (Medicago sativa)**

Aloe barbadensis

Artichoke (Cynara scolymus)

Burdock

Capsicum

Centella asiatica

Chamomile

Chrysanthemum parthenium

**Clover (Trifolium pratense)**

Ginkgo biloba

Hop (Humulus)

Juniper (Juniperus)

**Nutrients**

Parsley (Petroselinum crispum)

Peppermint (Mentha piperita)

Pollen

Rubus idaeus

Ruscus aculeatus

Seaweed

Spirulina  
(**nutritional system** for nervous system disorders)

IT **Fructooligosaccharides**

**Vitamins**

RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
(**nutritional system** for nervous system disorders)

IT Intestinal bacteria  
(probiotic; **nutritional system** for nervous system disorders)

IT Asparagus

Dandelion

Ginger

Hydrangea  
(root; **nutritional system** for nervous system disorders)

IT Drug delivery systems  
(solns.; **nutritional system** for nervous system disorders)

IT Rumex crispus  
(yellow dock; **nutritional system** for nervous system disorders)

IT 50-81-7, Vitamin c, biological studies 58-85-5, Biotin  
59-30-3, Folic acid, biological studies 59-43-8,  
Vitamin b1, biological studies 59-67-6D, Nicotinic acid,  
polymers 68-19-9, Vitamin b12 79-83-4,  
Vitamin b3 83-88-5, Vitamin b2, biological  
studies 98-92-0, Vitamin b3 107-43-7,  
Betaine 590-46-5, Betaine hydrochloride

1406-18-4, Vitamin e 7235-40-7,  
 .beta.-Carotene 7439-95-4, Magnesium, biological  
 studies 7439-98-7, Molybdenum, biological studies 7440-47-3, Chromium,  
 biological studies 7440-50-8, Copper, biological  
 studies 7440-66-6, Zinc, biological studies  
 7782-49-2, Selenium, biological studies 8049-47-6, Pancreatin  
 8059-24-3, Vitamin b6 9001-73-4, Papain 9001-75-6,  
 Pepsin

RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological  
 study); USES (Uses)

(nutritional system for nervous system disorders)

IT 50-81-7, Vitamin c, biological studies 59-30-3  
 , Folic acid, biological studies 59-43-8, Vitamin b1,  
 biological studies 59-67-6D, Nicotinic acid, polymers  
 68-19-9, Vitamin b12 79-83-4, Vitamin  
 b3 83-88-5, Vitamin b2, biological studies  
 107-43-7, Betaine 1406-18-4, Vitamin  
 e 7439-95-4, Magnesium, biological studies  
 7440-50-8, Copper, biological studies 7440-66-6  
 , Zinc, biological studies 8059-24-3, Vitamin  
 b6

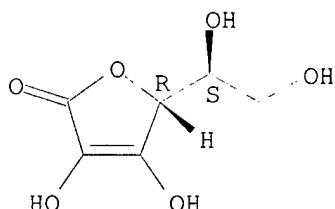
RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological  
 study); USES (Uses)

(nutritional system for nervous system disorders)

RN 50-81-7 HCAPLUS

CN L-Ascorbic acid (8CI, 9CI) (CA INDEX NAME)

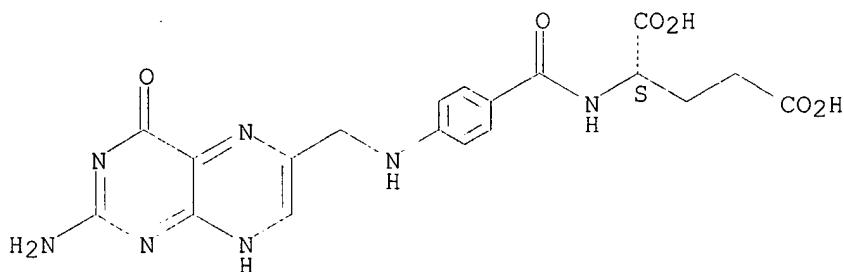
Absolute stereochemistry.



RN 59-30-3 HCAPLUS

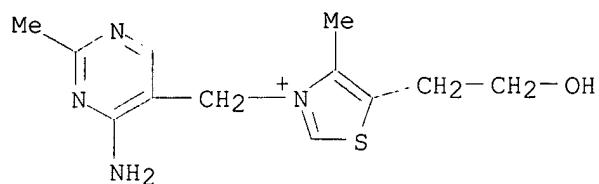
CN L-Glutamic acid, N-[4-[[[(2-amino-1,4-dihydro-4-oxo-6-pteridinyl)methyl]amino]benzoyl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



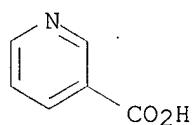
RN 59-43-8 HCAPLUS

CN Thiazolium, 3-[(4-amino-2-methyl-5-pyrimidinyl)methyl]-5-(2-hydroxyethyl)-4-methyl- chloride (9CI) (CA INDEX NAME)



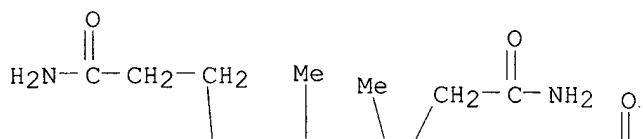
● Cl<sup>-</sup>

RN 59-67-6 HCPLUS  
 CN 3-Pyridinecarboxylic acid (9CI) (CA INDEX NAME)

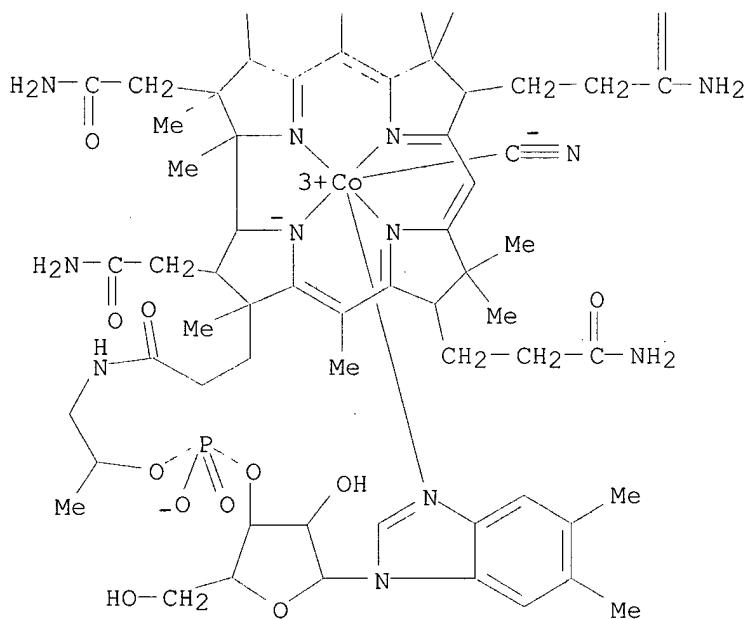


RN 68-19-9 HCPLUS  
 CN Vitamin B12 (8CI, 9CI) (CA INDEX NAME)

PAGE 1-A

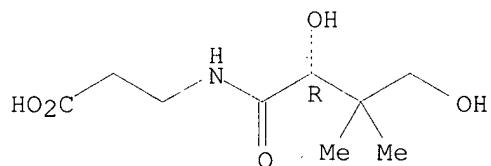


PAGE 2-A



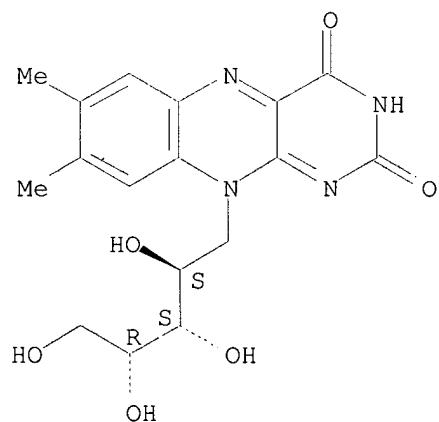
RN 79-83-4 HCAPLUS  
 CN .beta.-Alanine, N-[ (2R)-2,4-dihydroxy-3,3-dimethyl-1-oxobutyl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry. Rotation (+).



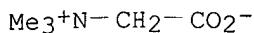
RN 83-88-5 HCAPLUS  
 CN Riboflavin (8CI, 9CI) (CA INDEX NAME)

Absolute stereochemistry.



RN 107-43-7 HCAPLUS

CN Methanaminium, 1-carboxy-N,N,N-trimethyl-, inner salt (9CI) (CA INDEX NAME)



RN 1406-18-4 HCAPLUS

CN Vitamin E (9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*

RN 7439-95-4 HCAPLUS

CN Magnesium (8CI, 9CI) (CA INDEX NAME)

Mg

RN 7440-50-8 HCAPLUS

CN Copper (7CI, 8CI, 9CI) (CA INDEX NAME)

Cu

RN 7440-66-6 HCAPLUS

CN Zinc (7CI, 8CI, 9CI) (CA INDEX NAME)

Zn

RN 8059-24-3 HCAPLUS

CN Vitamin B6 (8CI, 9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*

L114 ANSWER 6 OF 12 HCAPLUS COPYRIGHT 2003 ACS

AN 2001:833099 HCAPLUS

DN 135:362605

TI Nutritional preparation comprising ribose and folic acid and medical use thereof

IN Hageman, Robert Johan Joseph; Smeets, Rudolf Leonardus Lodewijk; Verlaan, George

PA N.V. Nutricia, Neth.

SO PCT Int. Appl., 29 pp.

CODEN: PIXXD2

DT Patent

LA English

IC ICM A61K031-7004

ICS A61K031-522; A23L001-09; A23L001-302; A61P003-00; A61P003-02; A61P039-06

CC 63-6 (Pharmaceuticals)

Section cross-reference(s): 17

FAN.CNT 1

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	WO 2001085178	A1	20011115	WO 2001-NL349	20010508
	W:	AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US,			

UZ, VN, YU, ZA, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM  
 RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZW, AT, BE, CH, CY,  
 DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, TR, BF,  
 BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG

US 6420342 B1 20020716 US 2000-566381 20000508

EP 1282426 A1 20030212 EP 2001-930315 20010508

R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT,  
 IE, SI, LT, LV, FI, RO, MK, CY, AL, TR

US 2002183263 A1 20021205 US 2002-178736 20020625

PRAI US 2000-566381 A 20000508  
 WO 2001-NL349 W 20010508

AB Trauma, surgery, inflammation, subfertility, lactation problems, gut  
 disorders, infant **nutrition**, cancer, arthritis and other joint  
 problems, vascular problems and cardio- or cerebrovascular problems,  
 ischemia, aging, impaired immune function, burns, sepsis, malnutrition,  
 problems with liver or kidneys, malaria, cystic fibrosis, migraine,  
 neurol. problems, respiratory infections, improvement of sports results,  
 muscle soreness, drug intoxication and pain can be treated with a  
**nutritional** compn. contg. effective amts. of **ribose** and  
 folic acid, optionally combined with other components such as niacin,  
 histidine, glutamine, orotate, **vitamin B6** and other components.

ST **nutrition** pharmaceutical **ribose** folic acid

IT Nervous system

(Huntington's chorea; **nutritional** prepn. comprising  
**ribose** and folic acid and medical use)

IT Digestive tract

Nervous system

(disease; **nutritional** prepn. comprising **ribose** and  
 folic acid and medical use)

IT Fertility

Lactation

(disorder; **nutritional** prepn. comprising **ribose** and  
 folic acid and medical use)

IT Poisoning, biological

(drug; **nutritional** prepn. comprising **ribose** and  
 folic acid and medical use)

IT Respiratory tract

(infection; **nutritional** prepn. comprising **ribose**  
 and folic acid and medical use)

IT Nucleotides, biological studies

RL: BSU (Biological study, unclassified); BIOL (Biological study)  
 (metab.; **nutritional** prepn. comprising **ribose** and  
 folic acid and medical use)

IT Alzheimer's disease

Analgesics

Antiarthritics

Antidepressants

Antitumor agents

Burn

Cardiovascular agents

Cystic fibrosis

Fatigue, biological

Immunity

Kidney, disease

Liver, disease

Malnutrition

Multiple sclerosis

Parkinson's disease

Schizophrenia

Sepsis

Surgery

Tuberculostatics

(**nutritional** prepn. comprising **ribose** and folic

acid and medical use)

IT Fatty acids, biological studies  
 RL: BSU (Biological study, unclassified); BIOL (Biological study)  
 (nutritional prepn. comprising **ribose** and folic acid and medical use)

IT Amino acids, biological studies  
 RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
 (nutritional prepn. comprising **ribose** and folic acid and medical use)

IT Muscle  
 (soreness; nutritional prepn. comprising **ribose** and folic acid and medical use)

IT Diet  
 (supplements; nutritional prepn. comprising **ribose** and folic acid and medical use)

IT Injury  
 (trauma; nutritional prepn. comprising **ribose** and folic acid and medical use)

IT 69-93-2, Uric acid, biological studies  
 RL: BSU (Biological study, unclassified); BIOL (Biological study)  
 (antioxidant; nutritional prepn. comprising **ribose** and folic acid and medical use)

IT 50-99-7, D-Glucose, biological studies 56-85-9,  
 Glutamine, biological studies 56-87-1, L-Lysine, biological studies 57-00-1, Creatine 59-43-8, Thiamine, biological studies 59-67-6, Niacin, biological studies 61-90-5, L-Leucine, biological studies 63-68-3, L-Methionine, biological studies 63-91-2, L-Phenylalanine, biological studies 65-86-1, Orotic acid 68-19-9, Vitamin b12 71-00-1, L-Histidine, biological studies 72-19-5, L-Threonine, biological studies 73-32-5, L-Isoleucine, biological studies 77-92-9, Citric acid, biological studies 107-35-7, Taurine 107-43-7, Betaine 303-98-0, Coenzyme q10 541-15-1, Carnitine 1200-22-2, .alpha.-Lipoic acid 7439-95-4, Magnesium, biological studies 7440-66-6, Zinc, biological studies 7782-49-2, Selenium, biological studies 8059-24-3, Vitamin b6 14265-44-2, Phosphate, biological studies 14808-79-8, Sulfate, biological studies  
 RL: FFD (Food or feed use); MOA (Modifier or additive use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
 (nutritional prepn. comprising **ribose** and folic acid and medical use)

IT 50-69-1, D-Ribose 59-30-3, Folic acid, biological studies  
 RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
 (nutritional prepn. comprising **ribose** and folic acid and medical use)

RE.CNT 5 THERE ARE 5 CITED REFERENCES AVAILABLE FOR THIS RECORD

RE

(1) Bioenergy Inc; WO 9965476 A 1999 HCPLUS  
 (2) Depha Team SRL; WO 9215311 A 1992 HCPLUS  
 (3) Naito, A; EP 0652012 A 1995 HCPLUS  
 (4) Oster, K; DE 2231989 A 1973 HCPLUS  
 (5) Oy Jurilab Ltd; WO 0128365 A 2001 HCPLUS

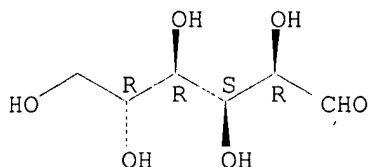
IT 50-99-7, D-Glucose, biological studies 63-68-3, L-Methionine, biological studies 77-92-9, Citric acid, biological studies 107-35-7, Taurine 107-43-7, Betaine 1200-22-2, .alpha.-Lipoic acid 7439-95-4, Magnesium, biological studies 7440-66-6, Zinc, biological studies  
 RL: FFD (Food or feed use); MOA (Modifier or additive use); THU

(Therapeutic use); BIOL (Biological study); USES (Uses)  
(nutritional prepn. comprising ribose and folic acid and medical use)

RN 50-99-7 HCPLUS

CN D-Glucose (8CI, 9CI) (CA INDEX NAME)

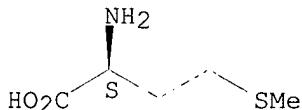
Absolute stereochemistry.



RN 63-68-3 HCPLUS

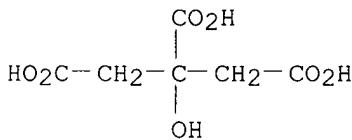
CN L-Methionine (9CI) (CA INDEX NAME)

Absolute stereochemistry.



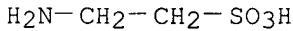
RN 77-92-9 HCPLUS

CN 1,2,3-Propanetricarboxylic acid, 2-hydroxy- (9CI) (CA INDEX NAME)



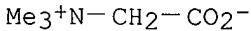
RN 107-35-7 HCPLUS

CN Ethanesulfonic acid, 2-amino- (9CI) (CA INDEX NAME)



RN 107-43-7 HCPLUS

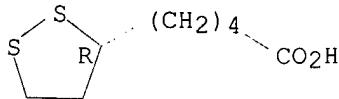
CN Methanaminium, 1-carboxy-N,N,N-trimethyl-, inner salt (9CI) (CA INDEX NAME)



RN 1200-22-2 HCPLUS

CN 1,2-Dithiolane-3-pentanoic acid, (3R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry. Rotation (+).



RN 7439-95-4 HCAPLUS  
CN Magnesium (8CI, 9CI) (CA INDEX NAME)

Mg

RN 7440-66-6 HCPLUS  
CN Zinc (7CI, 8CI, 9CI) (CA INDEX NAME)

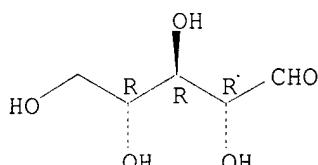
Zn

IT 50-69-1, D-Ribose

RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
(**nutritional** prepn. comprising **ribose** and folic acid and medical use)

RN 50-69-1 HCPLUS  
CN D-Ribose (9CI) (CA INDEX NAME)

## Absolute stereochemistry.



L114 ANSWER 7 OF 12 HCPLUS COPYRIGHT 2003 ACS

AN 1999:77453 HCAPLUS

DN 130:152854

TI Nutritional composition containing methionine.

IN Hageman, Robert Johan Joseph

PA N.V. Nutricia, Neth.

SO PCT Int. Appl., 22 pp.  
CODEN: PIXXD2

DT Patent

## LA English

IC ICM A23L001-305

ICS A61K031-195; A23L001-302; A23L001-304; A61K033-30

CC 17-6 (Food and Feed Chemistry)  
Section cross-reference(s): 63

FAN.CNT 2

PATENT NO.		KIND	DATE	APPLICATION NO.		DATE
PI	WO 9903365	A1	19990128	WO 1998-NL408		19980714
	W: AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CU, CZ, DE, DK, EE, ES, FI, GB, GE, GH, GM, HR, HU, ID, IL, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, UA, UG, US, UZ, VN, YU, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM RW: GH, GM, KE, LS, MW, SD, SZ, UG, ZW, AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG					
AU 9884658	A1	19990210	AU 1998-84658		19980714	
EP 1001685	A1	20000524	EP 1998-935394		19980714	
R: AT, BE, CH, DE, DK, FR, GB, LI, NL, SE, FI						

JP 2001510145 T2 20010731 JP 2000-502681 19980714  
 US 2002142025 A1 20021003 US 2000-462757 20000131  
 PRAI EP 1997-202206 A 19970714  
 WO 1998-NL408 W 19980714

AB An enteral **nutrient** compn. for clin. or dietary use, comprises, in addn. to **carbohydrates** and proteins or their hydrolyzates the following components or their **nutritional** equiv., per daily dosage: **methionine** (0.6-7 g), cysteine (0.5-2.5 g), folic acid (0.4-8 mg), pyridoxal (**vitamin B6**) (3-20 mg), **zinc** (18-120 mg) and at least 400 kcal energy in the form of **carbohydrates**. These amts. are well above the Recommended Daily Allowance (RDA) values. Further preferred components include lecithin, cyanocobalamin, **betaine** and **magnesium**, as well as transsulfuration metabolites, ATP enhancers and antioxidants.

ST diet therapeutic **methionine nutrient**; enteral diet therapeutic **methionine nutrient**

IT Fats and Glyceridic oils, biological studies  
 RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
 (algae; **nutritional** compn. contg. **methionine** for clin. and dietary enteral application)

IT Skin, disease  
 Skin, disease  
 (decubitus ulcer; **nutritional** compn. contg. **methionine** for clin. and dietary enteral application)

IT Cardiovascular system  
 (disease; **nutritional** compn. contg. **methionine** for clin. and dietary enteral application)

IT Immunity  
 (disorder; **nutritional** compn. contg. **methionine** for clin. and dietary enteral application)

IT **Nutrients**  
 (enteral; **nutritional** compn. contg. **methionine** for clin. and dietary enteral application)

IT Fats and Glyceridic oils, biological studies  
 RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
 (fish; **nutritional** compn. contg. **methionine** for clin. and dietary enteral application)

IT Syrups (sweetening agents)  
 (glucose; **nutritional** compn. contg. **methionine** for clin. and dietary enteral application)

IT Wheat  
 (hydrolyzate; **nutritional** compn. contg. **methionine** for clin. and dietary enteral application)

IT Glycerides, biological studies  
 RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
 (medium-chain; **nutritional** compn. contg. **methionine** for clin. and dietary enteral application)

IT Proteins, general, biological studies  
 RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
 (milk; **nutritional** compn. contg. **methionine** for clin. and dietary enteral application)

IT Aging, animal  
 Allergy  
 Antitumor agents  
 Arthritis  
 Autoimmune disease  
**Dietary energy**  
**Dietary fiber**  
 Inflammation

Neoplasm  
 Nerve, disease  
 Wound healing  
 (nutritional compn. contg. **methionine** for clin. and  
 dietary enteral application)  
 IT Amino acids, biological studies  
 Canola oil  
**Carbohydrates**, biological studies  
**Mineral elements, biological studies**  
 Nucleotides, biological studies  
 Phospholipids, biological studies  
 Protein hydrolyzates  
 Proteins, general, biological studies  
 Rape oil  
 Sunflower oil  
**Trace element nutrients**  
**Vitamins**  
 RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological  
 study); USES (Uses)  
 (nutritional compn. contg. **methionine** for clin. and  
 dietary enteral application)  
 IT Lecithins  
 RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological  
 study); USES (Uses)  
 (soya; nutritional compn. contg. **methionine** for  
 clin. and dietary enteral application)  
 IT **Diet**  
 (therapeutic; nutritional compn. contg. **methionine**  
 for clin. and dietary enteral application)  
 IT Proteins, specific or class  
 RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological  
 study); USES (Uses)  
 (whey; nutritional compn. contg. **methionine** for  
 clin. and dietary enteral application)  
 IT 50-81-7, Ascorbic acid, biological studies 52-90-4, L-Cysteine,  
 biological studies 56-45-1, L-Serine, biological studies 56-85-9,  
 L-Glutamine, biological studies 57-00-1, Creatine 57-50-1, Sucrose,  
 biological studies 58-85-5, Biotin 59-02-9, .alpha.-  
**Tocopherol** 59-30-3, Folic acid, biological studies  
 59-43-8, Thiamin, biological studies 59-67-6, Niacin,  
 biological studies 62-49-7, Choline 63-68-3, L-  
**Methionine**, biological studies 66-72-8, Pyridoxal 67-48-1,  
 Choline chloride 68-19-9, **Vitamin B12** 70-26-8,  
 L-Ornithine 73-22-3, L-Tryptophan, biological studies 74-79-3,  
 L-Arginine, biological studies 79-83-4, Pantothenic acid  
 83-88-5, Riboflavin, biological studies 98-92-0, Nicotinamide  
 107-35-7, **Taurine** 107-43-7, **Betaine**  
 127-17-3, Pyruvic acid, biological studies 134-03-2,  
**Sodium ascorbate** 541-15-1, Carnitine 866-84-2,  
**Potassium citrate** 1077-28-7, Thioctic acid  
 1406-18-4, **Vitamin E** 7439-89-6,  
**Iron**, biological studies 7439-95-4, **Magnesium**,  
 biological studies 7439-96-5, Manganese, biological studies 7439-98-7,  
 Molybdenum, biological studies 7440-47-3, Chromium, biological studies  
 7440-50-8, **Copper**, biological studies 7440-66-6  
 , **Zinc**, biological studies 7553-56-2, Iodine, biological  
 studies 7647-14-5, **Sodium chloride**, biological studies  
 7733-02-0, **Zinc** sulfate 7758-98-7, **Copper** sulfate,  
 biological studies 7782-41-4, Fluorine, biological studies 7782-49-2,  
 Selenium, biological studies 7785-87-7, Manganese sulfate 9050-36-6,  
 Maltodextrin 10043-83-1, **Magnesium phosphate**  
 10103-46-5, **Calcium phosphate** 13410-01-0,  
**Sodium selenate**

RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(nutritional compn. contg. **methionine** for clin. and dietary enteral application)

IT 50-81-7, Ascorbic acid, biological studies 52-90-4, L-Cysteine, biological studies 56-45-1, L-Serine, biological studies 56-85-9, L-Glutamine, biological studies 57-00-1, Creatine 57-50-1, Sucrose, biological studies 58-85-5, Biotin 59-02-9, .alpha.-**Tocopherol** 59-30-3, Folic acid, biological studies 59-43-8, Thiamin, biological studies 59-67-6, Niacin, biological studies 62-49-7, Choline 63-68-3, L-**Methionine**, biological studies 66-72-8, Pyridoxal 67-48-1, Choline chloride 68-19-9, **Vitamin B12** 70-26-8, L-Ornithine 73-22-3, L-Tryptophan, biological studies 74-79-3, L-Arginine, biological studies 79-83-4, Pantothenic acid 83-88-5, Riboflavin, biological studies 98-92-0, Nicotinamide 107-35-7, **Taurine** 107-43-7, **Betaine** 127-17-3, Pyruvic acid, biological studies 134-03-2, **Sodium** ascorbate 541-15-1, Carnitine 866-84-2, **Potassium citrate** 1077-28-7, Thioctic acid 1406-1 8-4, **Vitamin E** 7439-89-6, **Iron**, biological studies 7439-95-4, **Magnesium**, biological studies 7439-96-5, Manganese, biological studies 7439-98-7, Molybdenum, biological studies 7440-47-3, Chromium, biological studies 7440-50-8, **Copper**, biological studies 7440-66-6, **Zinc**, biological studies 7553-56-2, Iodine, biological studies 7647-14-5, **Sodium** chloride, biological studies 7733-02-0, **Zinc** sulfate 7758-98-7, **Copper** sulfate, biological studies 7782-41-4, Fluorine, biological studies 7782-49-2, Selenium, biological studies 7785-87-7, Manganese sulfate 9050-36-6, Maltodextrin 10043-83-1, **Magnesium phosphate** 10103-46-5, **Calcium phosphate** 13410-01-0, **Sodium** selenate

RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(nutritional compn. contg. **methionine** for clin. and dietary enteral application)

RE.CNT 5 THERE ARE 5 CITED REFERENCES AVAILABLE FOR THIS RECORD

RE

- (1) Bissbort, S; EP 0532369 A 1993 HCPLUS
- (2) Gitta Carmen Conway; GB 2292522 A 1996 HCPLUS
- (3) Keane, M; US 5215750 A 1993 HCPLUS
- (4) Luca, M; EP 0482715 A 1992
- (5) Millman, P; EP 0259167 A 1988 HCPLUS

IT 50-81-7, Ascorbic acid, biological studies 59-02-9, .alpha.-**Tocopherol** 59-30-3, Folic acid, biological studies 59-43-8, Thiamin, biological studies 59-67-6, Niacin, biological studies 63-68-3, L-**Methionine**, biological studies 68-19-9, **Vitamin B12** 79-83-4, Pantothenic acid 83-88-5, Riboflavin, biological studies 107-35-7, **Taurine** 107-43-7, **Betaine** 134-03-2, **Sodium** ascorbate 1406-18-4, **Vitamin E** 7439-89-6,

**Iron**, biological studies 7439-95-4, **Magnesium**, biological studies 7440-50-8, **Copper**, biological studies 7440-66-6, **Zinc**, biological studies

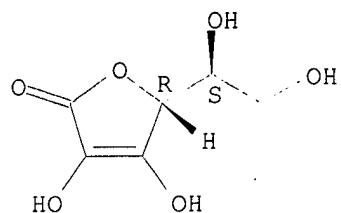
RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(nutritional compn. contg. **methionine** for clin. and dietary enteral application)

RN 50-81-7 HCPLUS

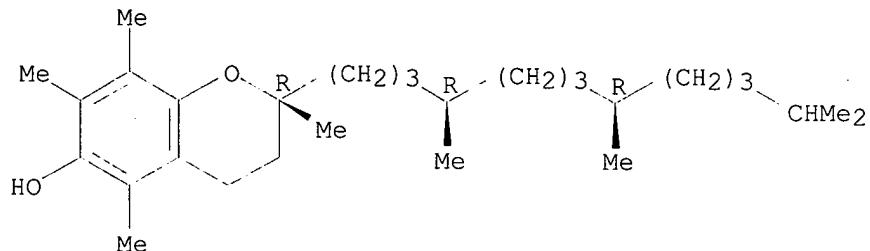
CN L-Ascorbic acid (8CI, 9CI) (CA INDEX NAME)

Absolute stereochemistry.



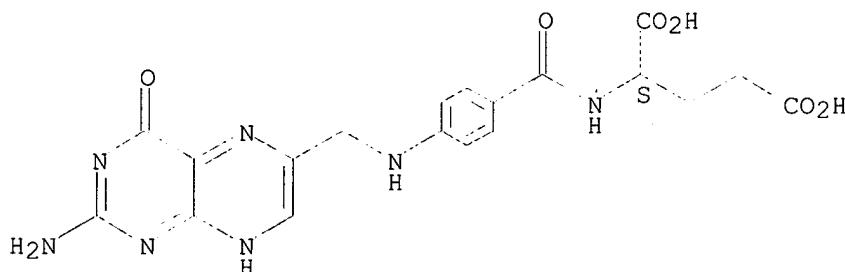
RN 59-02-9 HCAPLUS  
 CN 2H-1-Benzopyran-6-ol, 3,4-dihydro-2,5,7,8-tetramethyl-2-[(4R,8R)-4,8,12-trimethyltridecyl]-, (2R)- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

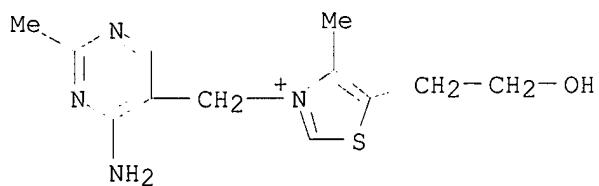


RN 59-30-3 HCAPLUS  
 CN L-Glutamic acid, N-[4-[(2-amino-1,4-dihydro-4-oxo-6-pteridinyl)methyl]amino]benzoyl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.

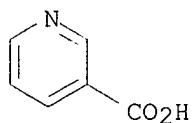


RN 59-43-8 HCAPLUS  
 CN Thiazolium, 3-[(4-amino-2-methyl-5-pyrimidinyl)methyl]-5-(2-hydroxyethyl)-4-methyl- chloride (9CI) (CA INDEX NAME)



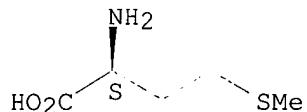
● Cl<sup>-</sup>

RN 59-67-6 HCAPLUS  
 CN 3-Pyridinecarboxylic acid (9CI) (CA INDEX NAME)



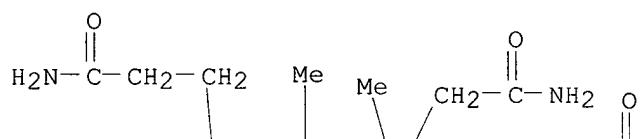
RN 63-68-3 HCAPLUS  
 CN L-Methionine (9CI) (CA INDEX NAME)

Absolute stereochemistry.

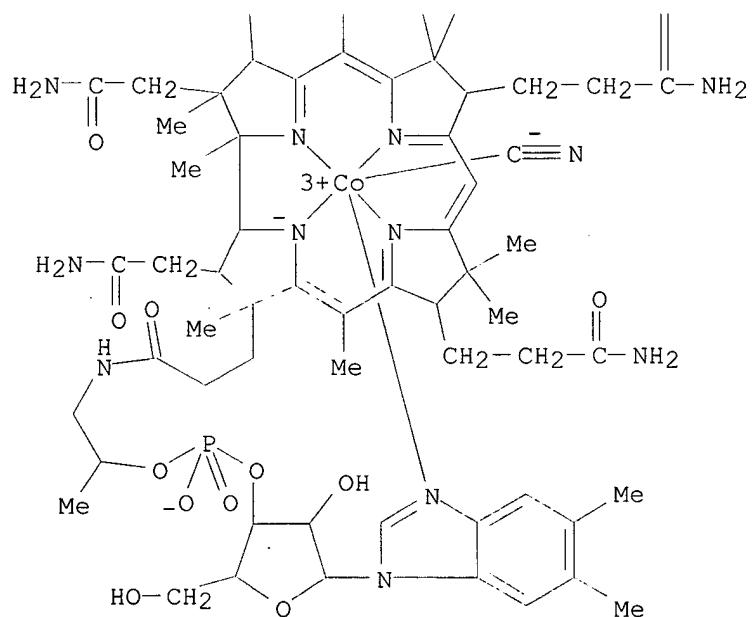


RN 68-19-9 HCAPLUS  
 CN Vitamin B12 (8CI, 9CI) (CA INDEX NAME)

PAGE 1-A

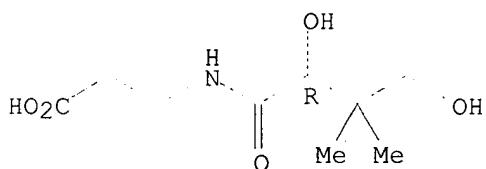


PAGE 2-A



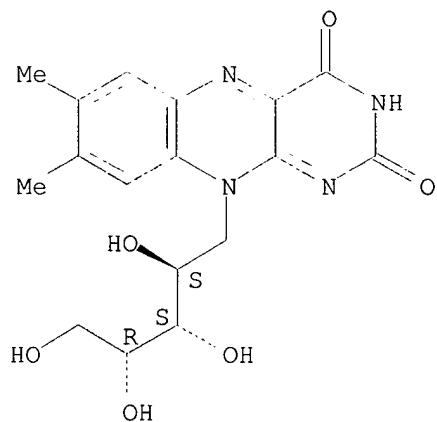
RN 79-83-4 HCAPLUS  
CN .beta.-Alanine, N-[(2R)-2,4-dihydroxy-3,3-dimethyl-1-oxobutyl]- (9CI) (CA  
INDEX NAME)

Absolute stereochemistry. Rotation (+).

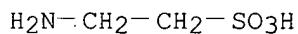


RN 83-88-5 HCAPLUS  
 CN Riboflavin (8CI, 9CI) (CA INDEX NAME)

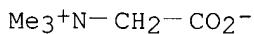
Absolute stereochemistry.



RN 107-35-7 HCAPLUS  
 CN Ethanesulfonic acid, 2-amino- (9CI) (CA INDEX NAME)

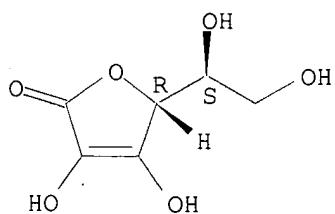


RN 107-43-7 HCAPLUS  
 CN Methanaminium, 1-carboxy-N,N,N-trimethyl-, inner salt (9CI) (CA INDEX NAME)



RN 134-03-2 HCAPLUS  
 CN L-Ascorbic acid, monosodium salt (8CI, 9CI) (CA INDEX NAME)

Absolute stereochemistry.



● Na

RN 1406-18-4 HCAPLUS  
 CN Vitamin E (9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*  
 RN 7439-89-6 HCAPLUS  
 CN Iron (7CI, 8CI, 9CI) (CA INDEX NAME)

Fe

RN 7439-95-4 HCAPLUS  
 CN Magnesium (8CI, 9CI) (CA INDEX NAME)

Mg

RN 7440-50-8 HCAPLUS  
 CN Copper (7CI, 8CI, 9CI) (CA INDEX NAME)

Cu

RN 7440-66-6 HCAPLUS  
 CN Zinc (7CI, 8CI, 9CI) (CA INDEX NAME)

Zn

L114 ANSWER 8 OF 12 HCAPLUS COPYRIGHT 2003 ACS  
 AN 1999:64536 HCAPLUS  
 DN 130:124200  
 TI Nutritional composition containing **methionine**  
 IN Hageman, Robert Johan Joseph  
 PA N.V. Nutricia, Neth.  
 SO Eur. Pat. Appl., 14 pp.  
 CODEN: EPXXDW  
 DT Patent  
 LA English  
 IC ICM A23L001-305  
 ICS A61K031-195; A23L001-302; A23L001-304; A61K033-30  
 CC 17-6 (**Food and Feed Chemistry**)  
 Section cross-reference(s): 18, 63  
 FAN.CNT 2

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	EP 891719	A1	19990120	EP 1997-202206	19970714
	R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, FI				
	AU 9884658	A1	19990210	AU 1998-84658	19980714
	EP 1001685	A1	20000524	EP 1998-935394	19980714
	R: AT, BE, CH, DE, DK, FR, GB, LI, NL, SE, FI				
	JP 2001510145	T2	20010731	JP 2000-502681	19980714
	US 2002142025	A1	20021003	US 2000-462757	20000131
PRAI	EP 1997-202206	A	19970714		
	WO 1998-NL408	W	19980714		
AB	An enteral food compn. for clin. or dietary use comprises, in addn. to <b>carbohydrates</b> and proteins or their hydrolyzates the following components or their <b>nutritional</b> equiv., per daily dosage: <b>methionine</b> (0.6-7 g), cysteine (0.5-2.5 g), folic acid (0.4-8 mg), pyridoxal ( <b>vitamin B6</b> ) (3-20 mg), <b>zinc</b> (18-120 mg) and at least 400 kcal energy in the form of <b>carbohydrates</b> . These amts. are well above the Recommended Daily Allowance (RDA) values. Further preferred components include lecithin, cyanocobalamin, <b>betaine</b> and <b>magnesium</b> , as well as transsulfuration metabolites, ATP enhancers and antioxidants.				
ST	<b>food methionine vitamin mineral supplement</b>				
IT	Cardiovascular system (disease; <b>nutritional</b> compn. contg. <b>methionine</b> )				
IT	<b>Caseins, biological studies</b> RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses) (metal complexes; <b>nutritional</b> compn. contg. <b>methionine</b> )				
IT	Allergy Antioxidants Arthritis Autoimmune disease <b>Dietary energy</b> Immunity Inflammation Neoplasm Nerve, disease Surgery Wound healing ( <b>nutritional</b> compn. contg. <b>methionine</b> )				
IT	Amino acids, biological studies <b>Carbohydrates</b> , biological studies Lecithins Lipids, biological studies <b>Mineral elements</b> , biological studies Nucleotides, biological studies Protein hydrolyzates Proteins, general, biological studies <b>Tocopherols</b> <b>Vitamins</b> RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses) ( <b>nutritional</b> compn. contg. <b>methionine</b> )				
IT	Aging, animal (premature; <b>nutritional</b> compn. contg. <b>methionine</b> )				
IT	<b>Diet</b> (therapeutic; <b>nutritional</b> compn. contg. <b>methionine</b> )				
IT	74-79-3, L-Arginine, biological studies RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)				

(7nutritional compn. contg. **methionine**)  
 IT 56-65-5, ATP, biological studies  
 RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
 (enhancers of; nutritional compn. contg. **methionine**)  
 )  
 IT 50-81-7, **Vitamin C**, biological studies 52-90-4,  
 L-Cysteine, biological studies 56-45-1, L-Serine, biological studies  
 56-85-9, L-Glutamine, biological studies 57-00-1, Creatine 58-85-5,  
 Biotin 59-30-3, Folic acid, biological studies 59-43-8  
 , Thiamin, biological studies 59-67-6, Niacin, biological  
 studies 62-49-7, Choline 63-68-3, **L-Methionine**,  
 biological studies 66-72-8, Pyridoxal 68-19-9, Cyanocobalamin  
 70-26-8, L-Ornithine 83-88-5, Riboflavin, biological studies  
 107-35-7, **Taurine** 107-43-7, **Betaine**  
 127-17-3, Pyruvic acid, biological studies 541-15-1, Carnitine  
 616-91-1, N-Acetylcysteine 1077-28-7, Thioctic acid 1406-18-4,  
**Vitamin E** 6027-13-0, Homocysteine 7439-95-4,  
**Magnesium**, biological studies 7439-96-5, Manganese, biological  
 studies 7440-50-8, **Copper**, biological studies  
 7440-66-6, **Zinc**, biological studies 7782-49-2,  
 Selenium, biological studies 9050-36-6, Maltodextrin  
 RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
 (nutritional compn. contg. **methionine**)

RE.CNT 5 THERE ARE 5 CITED REFERENCES AVAILABLE FOR THIS RECORD

RE

- (1) Bissbort, S; EP 0532369 A HCPLUS
- (2) Gitta, C; GB 2292522 A HCPLUS
- (3) Keane, M; US 5215750 A HCPLUS
- (4) Luca, M; EP 0482715 A
- (5) Millman, P; EP 0259167 A HCPLUS

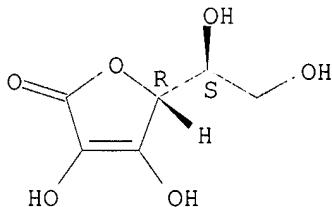
IT 50-81-7, **Vitamin C**, biological studies 59-30-3  
 , Folic acid, biological studies 59-43-8, Thiamin, biological  
 studies 59-67-6, Niacin, biological studies 63-68-3,  
**L-Methionine**, biological studies 68-19-9,  
 Cyanocobalamin 83-88-5, Riboflavin, biological studies  
 107-35-7, **Taurine** 107-43-7, **Betaine**  
 1406-18-4, **Vitamin E** 7439-95-4,  
**Magnesium**, biological studies 7440-50-8, **Copper**  
 , biological studies 7440-66-6, **Zinc**, biological  
 studies  
 RL: FFD (Food or feed use); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(nutritional compn. contg. **methionine**)

RN 50-81-7 HCPLUS

CN L-Ascorbic acid (8CI, 9CI) (CA INDEX NAME)

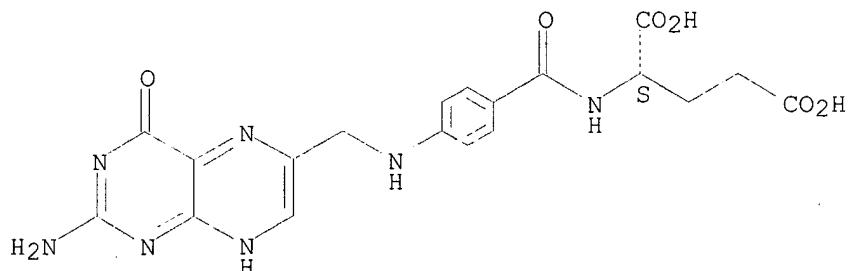
Absolute stereochemistry.



RN 59-30-3 HCPLUS

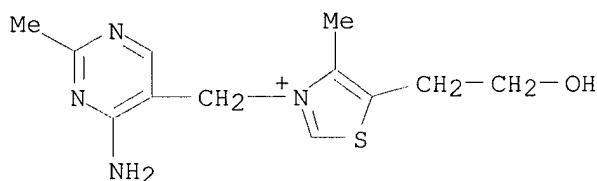
CN L-Glutamic acid, N-[4-[(2-amino-1,4-dihydro-4-oxo-6-pteridinyl)methyl]amino]benzoyl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



RN 59-43-8 HCPLUS

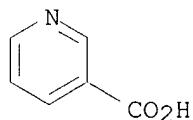
CN Thiazolium, 3-[(4-amino-2-methyl-5-pyrimidinyl)methyl]-5-(2-hydroxyethyl)-4-methyl- chloride (9CI) (CA INDEX NAME)



● Cl<sup>-</sup>

RN 59-67-6 HCPLUS

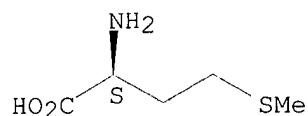
CN 3-Pyridinecarboxylic acid (9CI) (CA INDEX NAME)



RN 63-68-3 HCPLUS

CN L-Methionine (9CI) (CA INDEX NAME)

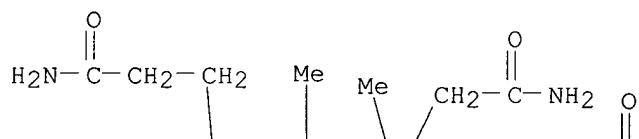
Absolute stereochemistry.



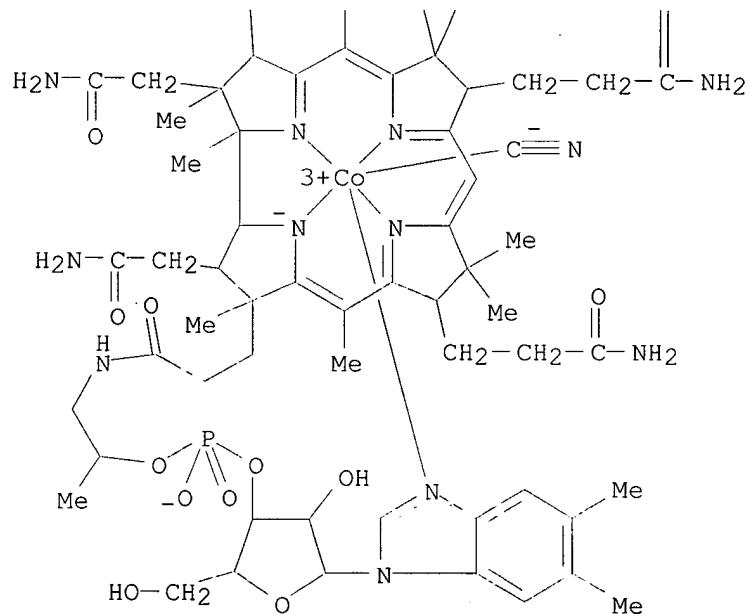
RN 68-19-9 HCPLUS

CN Vitamin B12 (8CI, 9CI) (CA INDEX NAME)

PAGE 1-A

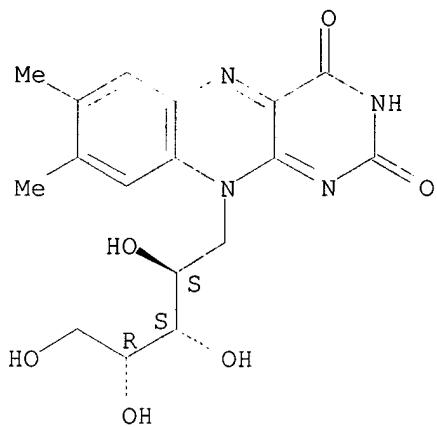


PAGE 2-A



RN 83-88-5 HCAPLUS  
CN Riboflavin (8CI, 9CI) (CA INDEX NAME)

## Absolute stereochemistry.



RN 107-35-7 HCAPLUS  
 CN Ethanesulfonic acid, 2-amino- (9CI) (CA INDEX NAME)

$\text{H}_2\text{N}-\text{CH}_2-\text{CH}_2-\text{SO}_3\text{H}$

RN 107-43-7 HCAPLUS  
 CN Methanaminium, 1-carboxy-N,N,N-trimethyl-, inner salt (9CI) (CA INDEX NAME)

$\text{Me}_3\text{N}^+-\text{CH}_2-\text{CO}_2^-$

RN 1406-18-4 HCAPLUS  
 CN Vitamin E (9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*  
 RN 7439-95-4 HCAPLUS  
 CN Magnesium (8CI, 9CI) (CA INDEX NAME)

Mg

RN 7440-50-8 HCAPLUS  
 CN Copper (7CI, 8CI, 9CI) (CA INDEX NAME)

Cu

RN 7440-66-6 HCAPLUS  
 CN Zinc (7CI, 8CI, 9CI) (CA INDEX NAME)

Zn

L114 ANSWER 9 OF 12 HCAPLUS COPYRIGHT 2003 ACS  
 AN 1998:744961 HCAPLUS  
 DN 130:7433  
 TI Treatment of sickle cell disease, treatment of immune system

diseases and other diseases normally associated with **sickle cell anemia**

IN Lockett, Curtis

PA USA

SO PCT Int. Appl., 19 pp.

CODEN: PIXXD2

DT Patent

LA English

IC ICM A61K033-32

ICS A61K033-24; A61K033-36; A61K033-04; A61K033-06; A61K035-78; A61K031-70; A61K031-51; A61K031-44; A61K031-355; A61K031-34; A61K031-07

CC 63-6 (Pharmaceuticals)

Section cross-reference(s): 1

FAN.CNT 1

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	WO 9850051	A1	19981112	WO 1997-US7122	19970505
	W: AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CU, CZ, DE, DK, EE, ES, FI, GB, GE, GH, HU, IL, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, TJ, TM, TR, TT, UA, UG, US, UZ, VN, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM				
	RW: GH, KE, LS, MW, SD, SZ, UG, AT, BE, CH, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, BF, BJ, CF, CG, CI, CM, GA, GN, ML, MR, NE, SN, TD, TG				
	AU 9729932	A1	19981127	AU 1997-29932	19970505

PRAI WO 1997-US7122 A 19970505

AB A maintenance regimen with controlled intake of particular **vitamin**, **mineral**, and micronutrient formulations, drastically reduces the incidence and severity of sickle cell disease crises. The formulations include **vitamin A**, **vitamin B-1**, **vitamin B-2**, **vitamin B-6**, **vitamin B-12**, **vitamin C**, **vitamin D**, **vitamin E**, niacinamide, para-aminobenzoic acid (PABA), pantothenic acid, choline bitartrate, inositol, rutin, citrus bioflavonoid complex, betaine hydrochloride, hesperidin complex, folic acid, biotin, calcium, iron, magnesium, zinc, potassium, manganese, iodine, chromium, selenium, and a pharmaceutically acceptable carrier, provided at or just below crit. satn. levels, detd. for each individual by carefully monitoring tolerance on titrn. The daily dose may exceed that necessary as dietary or nutritional supplements, and trigger an increase in the prodn. of viable Hb, and alters the overall blood profile. Platelet concn. is increased up to twice that seen in normal blood, and the red blood cells produced display increased resistance to sickling. This enhanced biosynthesis is achieved by providing sufficient stores of precursors that stimulate low level manuf. without substantial **feedback** control by the upper central nervous system.

ST sickle cell disease treatment **vitamin mineral**

micronutrient formulation; immune system disease treatment **vitamin mineral** micronutrient formulation

IT Flavonoids

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(bioflavonoids, citrus, complex; treatment of sickle cell disease and treatment of immune system diseases and other diseases normally assocd. with sickle cell anemia with **vitamin** and **mineral** and micronutrient formulations in humans)

IT Immunity

(disorder; treatment of sickle cell disease and treatment of immune system diseases and other diseases normally assocd. with sickle cell

anemia with **vitamin** and **mineral** and micronutrient formulations in humans)

IT Organ, animal  
 Organ, animal  
 (failure; treatment of sickle cell disease and treatment of immune system diseases and other diseases normally assocd. with sickle cell anemia with **vitamin** and **mineral** and micronutrient formulations in humans)

IT **Nutrients**  
 (micronutrients; treatment of sickle cell disease and treatment of immune system diseases and other diseases normally assocd. with sickle cell anemia with **vitamin** and **mineral** and micronutrient formulations in humans)

IT Drug delivery systems  
 (sustained-release; treatment of sickle cell disease and treatment of immune system diseases and other diseases normally assocd. with sickle cell anemia with **vitamin** and **mineral** and micronutrient formulations in humans)

IT Sickle cell anemia  
 (treatment of sickle cell disease and treatment of immune system diseases and other diseases normally assocd. with sickle cell anemia with **vitamin** and **mineral** and micronutrient formulations in humans)

IT **Mineral elements, biological studies**  
**Vitamins**  
 RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
 (treatment of sickle cell disease and treatment of immune system diseases and other diseases normally assocd. with sickle cell anemia with **vitamin** and **mineral** and micronutrient formulations in humans)

IT 50-81-7, Vitamin C, biological studies 58-85-5, Biotin  
 59-30-3, Folic acid, biological studies 59-43-8,  
 Vitamin B-1, biological studies 68-19-9, Vitamin  
 B-12 79-83-4, Pantothenic acid 83-88-5, Riboflavin,  
 biological studies 87-67-2, Choline bitartrate, biological studies  
 87-89-8, Inositol 98-92-0, Niacinamide 150-13-0,  
 p-Aminobenzoic acid 153-18-4, Rutin 590-46-5, Betaine  
 hydrochloride 1406-16-2, Vitamin D 1406-18-4  
 , Vitamin E 7439-89-6, Iron,  
 biological studies 7439-95-4, Magnesium, biological  
 studies 7439-96-5, Manganese, biological studies 7440-09-7,  
 Potassium, biological studies 7440-47-3, Chromium, biological  
 studies 7440-66-6, Zinc, biological studies  
 7440-70-2, Calcium, biological studies 7553-56-2,  
 Iodine, biological studies 7782-49-2, Selenium, biological studies  
 8059-24-3, Vitamin B-6 11103-57-4,  
 Vitamin A 12002-36-7, Hesperidin complex  
 RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
 (treatment of sickle cell disease and treatment of immune system diseases and other diseases normally assocd. with sickle cell anemia with **vitamin** and **mineral** and micronutrient formulations in humans)

RE.CNT 5 THERE ARE 5 CITED REFERENCES AVAILABLE FOR THIS RECORD

RE

- (1) Chima; US 4904678 A 1990 HCPLUS
- (2) Hider; US 4866052 A 1989 HCPLUS
- (3) Ohnishi; US 5114972 A 1992 HCPLUS
- (4) Walaszek; US 5364644 A 1994 HCPLUS
- (5) Wilburn; US 5108754 A 1992 HCPLUS

IT 50-81-7, Vitamin C, biological studies 59-30-3  
 , Folic acid, biological studies 59-43-8, Vitamin B-1,  
 biological studies 68-19-9, Vitamin B-12  
 79-83-4, Pantothenic acid 83-88-5, Riboflavin,  
 biological studies 87-89-8, Inositol 1406-16-2  
 , Vitamin D 1406-18-4, Vitamin E  
 7439-89-6, Iron, biological studies 7439-95-4,  
 Magnesium, biological studies 7440-09-7,  
 Potassium, biological studies 7440-66-6, Zinc,  
 biological studies 7440-70-2, Calcium, biological  
 studies 8059-24-3, Vitamin B-6 11103-57-4,  
**Vitamin A**

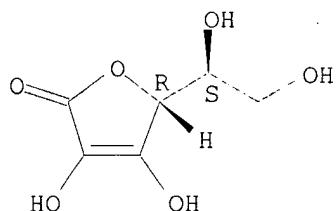
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(treatment of sickle cell disease and treatment of immune system diseases and other diseases normally assocd. with sickle cell anemia with **vitamin** and **mineral** and micronutrient formulations in humans)

RN 50-81-7 HCPLUS

CN L-Ascorbic acid (8CI, 9CI) (CA INDEX NAME)

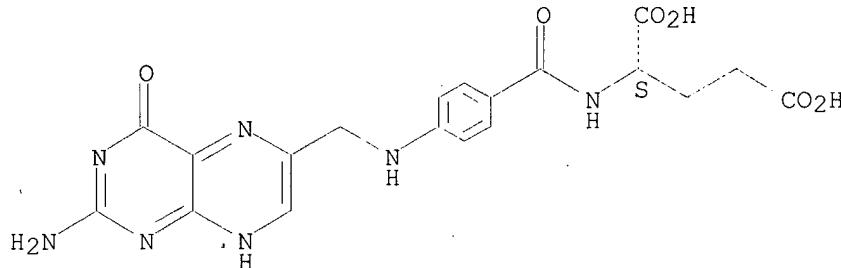
Absolute stereochemistry.



RN 59-30-3 HCPLUS

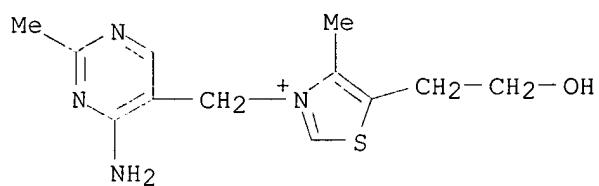
CN L-Glutamic acid, N-[4-[(2-amino-1,4-dihydro-4-oxo-6-pteridinyl)methyl]amino]benzoyl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



RN 59-43-8 HCPLUS

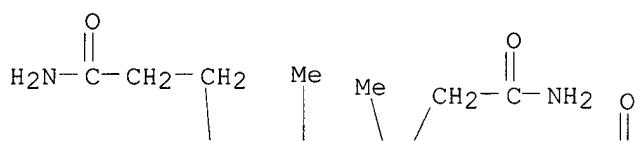
CN Thiazolium, 3-[(4-amino-2-methyl-5-pyrimidinyl)methyl]-5-(2-hydroxyethyl)-4-methyl- chloride (9CI) (CA INDEX NAME)



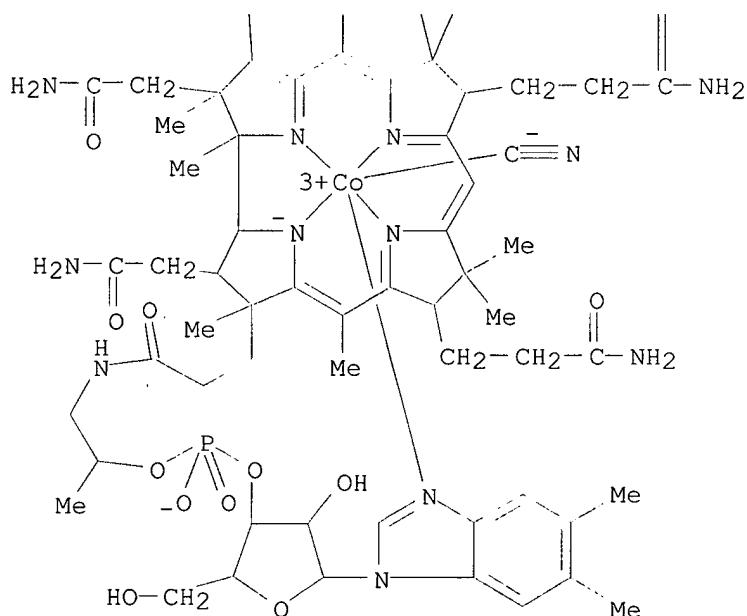
● Cl<sup>-</sup>

RN 68-19-9 HCPLUS  
CN Vitamin B12 (8CI, 9CI) (CA INDEX NAME)

PAGE 1-A



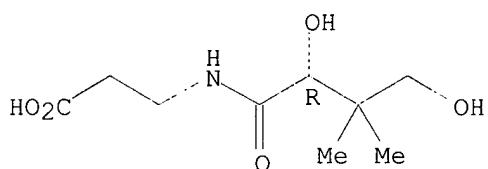
PAGE 2-A



RN 79-83-4 HCAPLUS

CN .beta.-Alanine, N-[(2R)-2,4-dihydroxy-3,3-dimethyl-1-oxobutyl]- (9CI) (CA INDEX NAME)

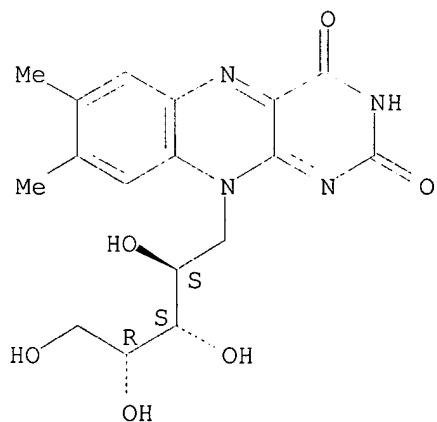
Absolute stereochemistry. Rotation (+).



RN 83-88-5 HCAPLUS

CN Riboflavin (8CI, 9CI) (CA INDEX NAME)

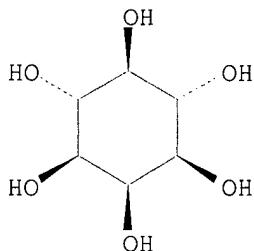
Absolute stereochemistry.



RN 87-89-8 HCAPLUS

CN myo-Inositol (9CI) (CA INDEX NAME)

Relative stereochemistry.



RN 1406-16-2 HCAPLUS

CN Vitamin D (8CI, 9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*

RN 1406-18-4 HCAPLUS

CN Vitamin E (9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*

RN 7439-89-6 HCAPLUS

CN Iron (7CI, 8CI, 9CI) (CA INDEX NAME)

Fe

RN 7439-95-4 HCAPLUS

CN Magnesium (8CI, 9CI) (CA INDEX NAME)

Mg

RN 7440-09-7 HCAPLUS

CN Potassium (8CI, 9CI) (CA INDEX NAME)

K

RN 7440-66-6 HCAPLUS

CN Zinc (7CI, 8CI, 9CI) (CA INDEX NAME)

Zn

RN 7440-70-2 HCAPLUS

CN Calcium (8CI, 9CI) (CA INDEX NAME)

Ca

RN 8059-24-3 HCAPLUS

CN Vitamin B6 (8CI, 9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*

RN 11103-57-4 HCAPLUS

CN Vitamin A (9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*

L114 ANSWER 10 OF 12 HCAPLUS COPYRIGHT 2003 ACS  
 AN 1997:321923 HCAPLUS  
 DN 126:347291  
 TI **Vitamins and minerals** for the treatment of sickle cell disease  
 IN Lockett, Curtis G.  
 PA Lockett, Curtis G., USA  
 SO U.S., 5 pp.  
 CODEN: USXXAM  
 DT Patent  
 LA English  
 IC ICM A61K033-32  
 ICS A61K033-24; A61K033-36; A61K033-06; A61K033-04; A61K035-78;  
 A61K031-70; A61K031-51; A61K031-44; A61K031-355; A61K031-34;  
 A61K031-07  
 NCL 424639000  
 CC 63-6 (Pharmaceuticals)  
 Section cross-reference(s): 1

FAN.CNT 1

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	US 5626884	A	19970506	US 1995-516737	19950818
PRAI	US 1995-516737		19950818		

AB A maintenance regimen with controlled intake of particular **vitamin**, **mineral**, and micronutrient formulations, drastically reduces the incidence and severity of sickle cell disease crises. The formulations include **vitamin A**, **vitamin B1**, **vitamin B2**, **vitamin B6**, **vitamin B12**, **vitamin C**, **vitamin D**, **vitamin E**, niacinamide, p-aminobenzoic acid, pantothenic acid, choline bitartrate, **inositol**, rutin, citrus bioflavonoid complex, **betaine**.cntdot.HCl, hesperidin complex, folic acid, biotin, **calcium**, **iron**, **magnesium**, **zinc**, **potassium**, manganese, iodine, chromium, selenium, and a pharmaceutically acceptable carrier, provided at or just below crit. satn. levels, detd. for each individual by carefully monitoring tolerance on titrn. The daily dose may exceed that necessary as dietary or **nutritional** supplements, and trigger an increase in the prodn. of viable Hb, and alters the overall blood profile. Platelet concn. is increased up to twice that of seen in normal blood, and the red blood cells produced display increased resistance to sickling. This enhanced biosynthesis is achieved by providing sufficient stores of precursors that stimulate low level manuf. without substantial **feedback** control by the upper central nervous system.

ST **vitamin mineral** sickle cell disease

IT Flavonoids

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(bioflavonoids; **vitamins** and **minerals** for treatment of sickle cell disease)

IT Drug delivery systems

(sustained-release; **vitamins** and **minerals** for treatment of sickle cell disease)

IT Sickle cell anemia

(**vitamins** and **minerals** for treatment of sickle cell disease)

IT Minerals, biological studies

Vitamins

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(vitamins and minerals for treatment of sickle cell disease)

IT 50-81-7, Vitamin C, biological studies 58-85-5, Biotin; 59-30-3, Folic acid, biological studies 59-43-8, Vitamin B-1, biological studies 68-19-9, Vitamin B-12 79-83-4, Pantothenic acid 83-88-5, Vitamin B-2, biological studies 87-67-2, Choline bitartrate, biological studies 87-89-8, Inositol 98-92-0, Niacinamide 150-13-0 153-18-4, Rutin 520-26-3D, Hesperidin, complexes 590-46-5, Betaine hydrochloride 1406-16-2, Vitamin D 1406-18-4, Vitamin E 7439-89-6, Iron;, biological studies 7439-95-4, Magnesium;, biological studies 7439-96-5, Manganese, biological studies 7440-09-7, Potassium;, biological studies 7440-47-3, Chromium;, biological studies 7440-66-6, Zinc;, biological studies 7440-70-2, Calcium;, biological studies 7553-56-2, Iodine;, biological studies 7782-49-2, Selenium., biological studies 8059-24-3, Vitamin B-6 11103-57-4, Vitamin A

RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(vitamins and minerals for treatment of sickle cell disease)

IT 50-81-7, Vitamin C, biological studies 59-30-3, Folic acid, biological studies 59-43-8, Vitamin B-1, biological studies 68-19-9, Vitamin B-12 79-83-4, Pantothenic acid 83-88-5, Vitamin B-2, biological studies 87-89-8, Inositol 1406-16-2, Vitamin D 1406-18-4, Vitamin E 7439-89-6, Iron;, biological studies 7439-95-4, Magnesium;, biological studies 7440-09-7, Potassium;, biological studies 7440-66-6, Zinc;, biological studies 7440-70-2, Calcium;, biological studies 8059-24-3, Vitamin B-6 11103-57-4, Vitamin A

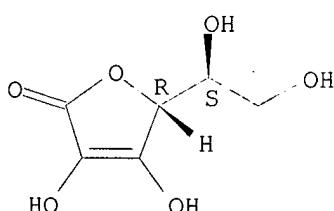
RL: BAC (Biological activity or effector, except adverse); BSU (Biological study, unclassified); THU (Therapeutic use); BIOL (Biological study); USES (Uses)

(vitamins and minerals for treatment of sickle cell disease)

RN 50-81-7 HCPLUS

CN L-Ascorbic acid (8CI, 9CI) (CA INDEX NAME)

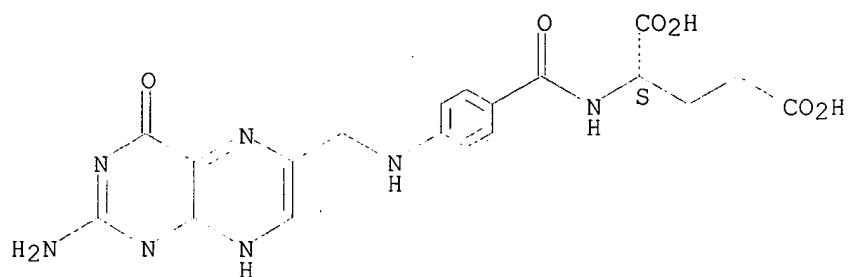
Absolute stereochemistry.



RN 59-30-3 HCPLUS

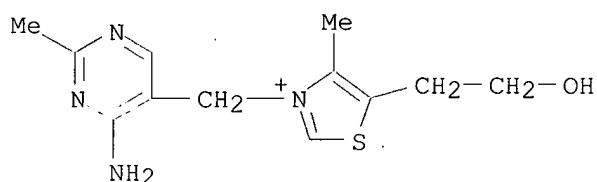
CN L-Glutamic acid, N-[4-[(2-amino-1,4-dihydro-4-oxo-6-pteridinyl)methyl]amino]benzoyl]- (9CI) (CA INDEX NAME)

Absolute stereochemistry.



RN 59-43-8 HCPLUS

CN Thiazolium, 3-[(4-amino-2-methyl-5-pyrimidinyl)methyl]-5-(2-hydroxyethyl)-4-methyl- chloride (9CI) (CA INDEX NAME)



● Cl<sup>-</sup>

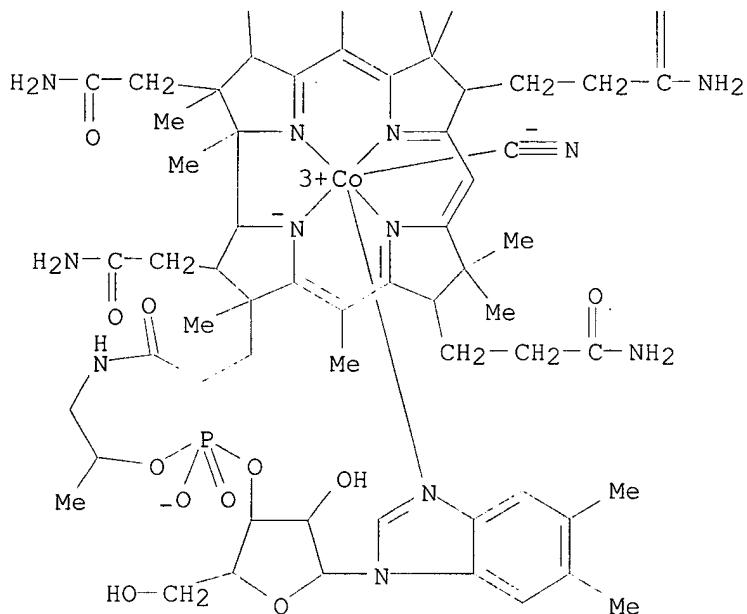
RN 68-19-9 HCPLUS

CN Vitamin B12 (8CI, 9CI) (CA INDEX NAME)

PAGE 1-A



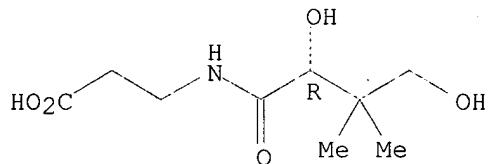
PAGE 2-A



RN 79-83-4 HCPLUS

CN .beta.-Alanine, N-[(2R)-2,4-dihydroxy-3,3-dimethyl-1-oxobutyl]- (9CI) (CA INDEX NAME)

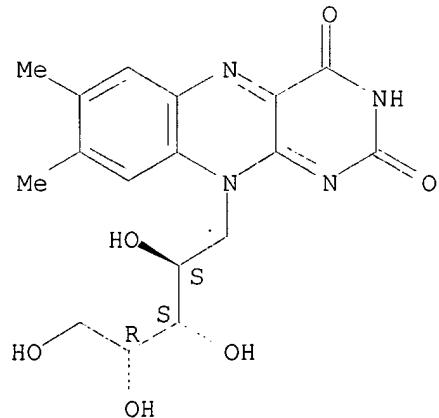
Absolute stereochemistry. Rotation (+).



RN 83-88-5 HCPLUS

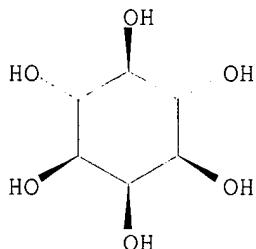
CN Riboflavin (8CI, 9CI) (CA INDEX NAME)

Absolute stereochemistry.



RN 87-89-8 HCAPLUS  
 CN myo-Inositol (9CI) (CA INDEX NAME)

Relative stereochemistry.



RN 1406-16-2 HCAPLUS  
 CN Vitamin D (8CI, 9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*

RN 1406-18-4 HCAPLUS  
 CN Vitamin E (9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*

RN 7439-89-6 HCAPLUS  
 CN Iron (7CI, 8CI, 9CI) (CA INDEX NAME)

Fe

RN 7439-95-4 HCAPLUS  
 CN Magnesium (8CI, 9CI) (CA INDEX NAME)

Mg

RN 7440-09-7 HCAPLUS  
 CN Potassium (8CI, 9CI) (CA INDEX NAME)

K

RN 7440-66-6 HCAPLUS  
 CN Zinc (7CI, 8CI, 9CI) (CA INDEX NAME)

Zn

RN 7440-70-2 HCAPLUS  
 CN Calcium (8CI, 9CI) (CA INDEX NAME)

Ca

RN 8059-24-3 HCAPLUS  
 CN Vitamin B6 (8CI, 9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*

RN 11103-57-4 HCAPLUS  
CN Vitamin A (9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*

L114 ANSWER 11 OF 12 HCAPLUS COPYRIGHT 2003 ACS  
 AN 1997:97785 HCAPLUS  
 DN 126:148521  
 TI **Vitamin/mineral** composition  
 IN Williams, Andrew H.; Williams, Eric A.  
 PA Williams, Andrew H., USA; Williams, Eric A.  
 SO U.S., 5 pp.  
 CODEN: USXXAM  
 DT Patent  
 LA English  
 IC ICM A61K035-28  
 ICS A61K035-26; A61K033-32; A61K033-24; A61K031-70; A61K031-34;  
 A61K031-355; A61K031-07  
 NCL 424579000  
 CC 63-6 (Pharmaceuticals)  
 Section cross-reference(s): 18

FAN.CNT 1

	PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
PI	US 5597585	A	19970128	US 1995-578284	19951226
PRAI	US 1995-578284		19951226		

AB **Vitamin/mineral nutritional mixt.** in the  
 form of a dry powder sol. in water was described.

ST **vitamin mineral compn**

IT Spleen  
 Thymus gland  
 (conc.; **vitamin/mineral compn.**)

IT **Mineral elements, biological studies****Vitamins**

RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
 (**vitamin/mineral compn.**)  
 IT **50-81-7, Vitamin c**, biological studies 52-90-4,  
 L-Cysteine, biological studies 58-85-5, Biotin 59-30-3, Folic  
 acid, biological studies 59-43-8, **Vitamin b1**,  
 biological studies 59-51-8, **Methionine 59-67-6**  
 , Niacin, biological studies 60-00-4, Edta, biological studies  
 62-49-7, Choline 68-19-9, **Vitamin b12 79-83-4**  
 , Pantothenic acid 83-88-5, **Vitamin b2**, biological  
 studies 87-89-8, **Inositol 98-92-0**, Niacinamide  
**107-43-7, Betaine 1406-18-4, Vitamin**  
**e 7439-95-4, Magnesium**, biological studies  
 7439-96-5, Manganese, biological studies 7440-09-7,  
**Potassium**, biological studies 7440-47-3, Chromium, biological  
 studies 7440-66-6, **Zinc**, biological studies  
 7782-49-2, Selenium, biological studies 8059-24-3,  
**Vitamin b6 11103-57-4, Vitamin a**

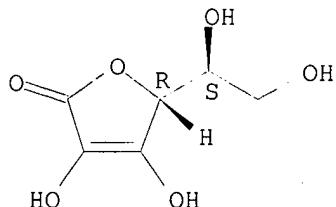
RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
 (**vitamin/mineral compn.**)

IT **50-81-7, Vitamin c**, biological studies 59-30-3  
 , Folic acid, biological studies 59-43-8, **Vitamin b1**,  
 biological studies 59-51-8, **Methionine 59-67-6**  
 , Niacin, biological studies 68-19-9, **Vitamin b12**  
**79-83-4**, Pantothenic acid 83-88-5, **Vitamin b2**,  
 biological studies 87-89-8, **Inositol 107-43-7**  
 , **Betaine 1406-18-4, Vitamin e**  
**7439-95-4, Magnesium**, biological studies  
**7440-09-7, Potassium**, biological studies

7440-66-6, Zinc, biological studies 8059-24-3,  
 Vitamin b6 11103-57-4, Vitamin a  
 RL: THU (Therapeutic use); BIOL (Biological study); USES (Uses)  
 (vitamin/mineral compn.)

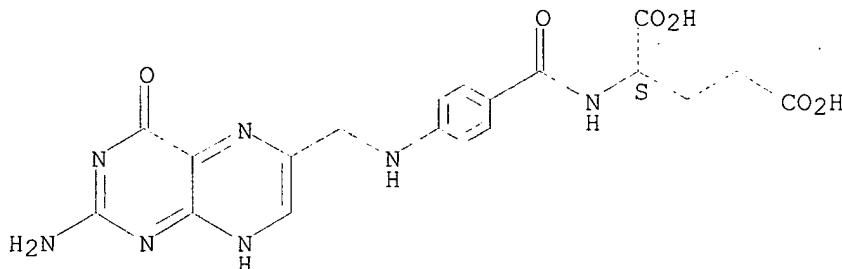
RN 50-81-7 HCPLUS  
 CN L-Ascorbic acid (8CI, 9CI) (CA INDEX NAME)

Absolute stereochemistry.

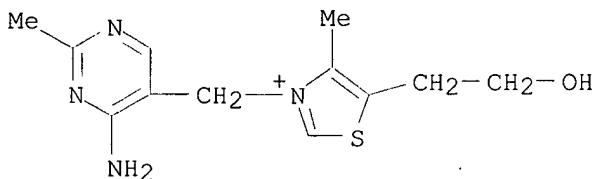


RN 59-30-3 HCPLUS  
 CN L-Glutamic acid, N-[4-[(2-amino-1,4-dihydro-4-oxo-6-pteridinyl)methyl]amino]benzoyl]-(9CI) (CA INDEX NAME)

Absolute stereochemistry.

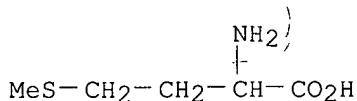


RN 59-43-8 HCPLUS  
 CN Thiazolium, 3-[(4-amino-2-methyl-5-pyrimidinyl)methyl]-5-(2-hydroxyethyl)-4-methyl- chloride (9CI) (CA INDEX NAME)

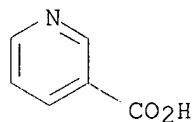


● Cl<sup>-</sup>

RN 59-51-8 HCPLUS  
 CN Methionine (9CI) (CA INDEX NAME)

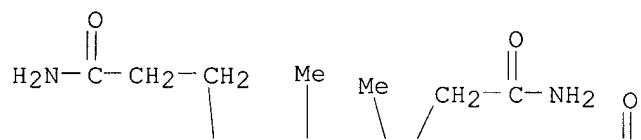


RN 59-67-6 HCPLUS  
CN 3-Pyridinecarboxylic acid (9CI) (CA INDEX NAME)

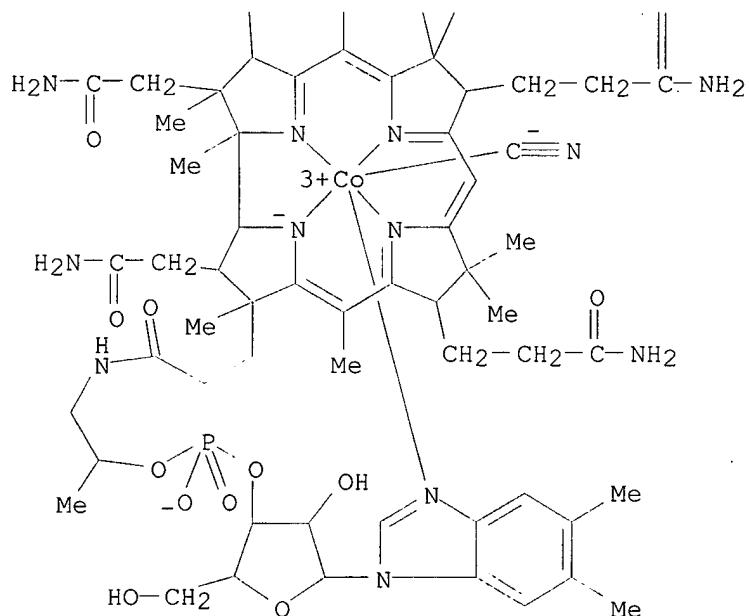


RN 68-19-9 HCPLUS  
CN Vitamin B12 (8CI, 9CI) (CA INDEX NAME)

PAGE 1-A



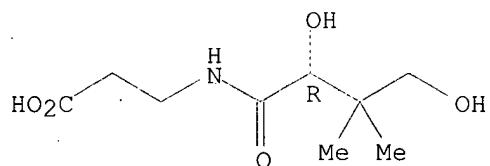
PAGE 2-A



RN 79-83-4 HCPLUS

CN .beta.-Alanine, N-[(2R)-2,4-dihydroxy-3,3-dimethyl-1-oxobutyl]- (9CI) (CA INDEX NAME)

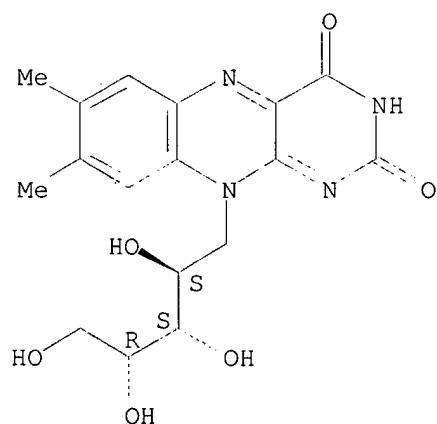
Absolute stereochemistry. Rotation (+).



RN 83-88-5 HCPLUS

CN Riboflavin (8CI, 9CI) (CA INDEX NAME)

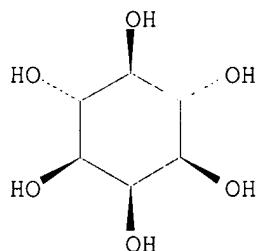
Absolute stereochemistry.



RN 87-89-8 HCPLUS

CN myo-Inositol (9CI) (CA INDEX NAME)

Relative stereochemistry.



RN 107-43-7 HCAPLUS

CN Methanaminium, 1-carboxy-N,N,N-trimethyl-, inner salt (9CI) (CA INDEX NAME)

Me<sub>3</sub><sup>+</sup>N—CH<sub>2</sub>—CO<sub>2</sub><sup>-</sup>

RN 1406-18-4 HCAPLUS

CN Vitamin E (9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*

RN 7439-95-4 HCAPLUS

CN Magnesium (8CI, 9CI) (CA INDEX NAME)

Mg

RN 7440-09-7 HCAPLUS

CN Potassium (8CI, 9CI) (CA INDEX NAME)

K

RN 7440-66-6 HCAPLUS

CN Zinc (7CI, 8CI, 9CI) (CA INDEX NAME)

Zn

RN 8059-24-3 HCAPLUS

CN Vitamin B6 (8CI, 9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*

RN 11103-57-4 HCAPLUS

CN Vitamin A (9CI) (CA INDEX NAME)

\*\*\* STRUCTURE DIAGRAM IS NOT AVAILABLE \*\*\*

L114 ANSWER 12 OF 12 HCAPLUS COPYRIGHT 2003 ACS

AN 1990:62458 HCAPLUS

DN 112:62458

TI Absorption of water and solute from glucose-electrolyte solutions in the human jejunum: effect of **citrate** or betaine

AU Leiper, John B.; Maughan, R. J.

CS Dep. Environ. Occup. Med., Univ. Med. Sch., Foresterhill/Aberdeen, AB9  
2ZZ, UK

SO Scandinavian Journal of Gastroenterology (1989), 24(9), 1089-94  
CODEN: SJGRA4; ISSN: 0036-5521

DT Journal

LA English

CC 63-5 (Pharmaceuticals)

Section cross-reference(s): 1

AB Using a modified perfusion system, water and solute absorption in the normal human intestine from two effervescent glucose-electrolyte solns., contg. either **citrate** or betaine-HCl, was examd. and the absorption rates were compared with those from a commonly used bicarbonate-contg. oral rehydration soln. Absorption of **citrate** (355 .mu.mol/cm/h) and betaine (313 .mu.mol/cm/h) occurred from the resp. solns. The inclusion of 46 mmol/L **citrate** or 36 mmol/L betaine in effervescent oral rehydration solns. had no effect on water or solute absorption.

ST oral rehydration soln glucose electrolyte; intestine absorption water solute rehydration soln; **citrate** betaine intestine absorption rehydration

IT Electrolytes  
(rehydration oral solns. contg., water and solute absorption by human intestine from, betaine and **citrate** effect on)

IT Intestine, metabolism  
(jejunum, water and solute absorption by human, from glucose-electrolyte rehydration solns., betaine and **citrate** effect on)

IT Hydration, biological  
(re-, glucose-electrolyte solns. for, water and solute absorption by human intestine from, betaine and **citrate** effect on)

IT Pharmaceutical dosage forms  
(tablets, effervescent, rehydration oral soln. from, water and solute absorption by human intestine from, betaine and **citrate** effect on)

IT 7732-18-5  
RL: BIOL (Biological study)  
(electrolytes, rehydration oral solns. contg., water and solute absorption by human intestine from, betaine and **citrate** effect on)

IT 77-92-9, biological studies 107-43-7  
RL: BIOL (Biological study)  
(rehydration oral soln. contg., water and solute absorption by human intestine in relation to)

IT 77-92-9, biological studies 107-43-7  
RL: BIOL (Biological study)  
(rehydration oral soln. contg., water and solute absorption by human intestine in relation to)

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FILE 'WPIX' ENTERED AT 13:27:12 ON 10 MAR 2003  
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FILE LAST UPDATED: 7 MAR 2003 <20030307/UP>  
MOST RECENT DERWENT UPDATE: 200316 <200316/DW>  
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>>> PATENT IMAGES AVAILABLE FOR PRINT AND DISPLAY <<<

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[<<<](http://www.stn-international.de/training_center/patents/stn_guide.pdf)

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GUIDES, PLEASE VISIT:  
[<<<](http://www.derwent.com/userguides/dwpi_guide.html)

=> d all abeq tech abex tot 1125

L125 ANSWER 1 OF 3 WPIX (C) 2003 THOMSON DERWENT  
AN 2002-608421 [65] WPIX

DNC C2002-172023

TI Fluid useful in the treatment of hypohydration comprises  
**methylamine**, flavanolignan.

DC B05

IN HAGEMAN, R J J; SMEETS, R L L; VERLAAN, G

PA (HAGE-I) HAGEMAN R J J; (SMEE-I) SMEETS R L L; (VERL-I) VERLAAN G;  
(NUTR-N) NUTRICIA NV

CYC 94

PI WO 2002058792 A2 20020801 (200265)\* EN 22p A61P001-12 <--  
RW: AT BE CH CY DE DK EA ES FI FR GB GH GM GR IE IT KE LS LU MC MW MZ  
NL OA PT SD SE SL SZ TR TZ UG ZM ZW  
W: AE AG AL AM AU AZ BA BB BG BR BY BZ CA CH CN CO CR DM DZ EC ES GB  
GD GE GH GM HU ID IL IN IS JP KE KG KP KR KZ LC LK LR LS LT LU LV  
MA MD MG MK MN MW MX MZ NO NZ OM PH PL PT RO RU SD SE SG SI SL TJ  
TM TN TR TZ UA US UZ VN YU ZA ZM ZW

US 2002176881 A1 20021128 (200281) A61K047-00

ADT WO 2002058792 A2 WO 2002-NL63 20020128; US 2002176881 A1 US 2001-770773  
20010126

PRAI US 2001-770773 20010126

IC ICM A61K047-00; A61P001-12  
ICS A61K031-35; **A61K031-70**

AB WO 200258792 A UPAB: 20021010

NOVELTY - A fluid (I) comprises **methylamine** and/or  
flavanolignan, at least one digestible carbohydrate, and at least one  
mineral.

DETAILED DESCRIPTION - INDEPENDENT CLAIMS are also included for:  
(1) A concentrate for preparation of (I); and  
(2) a method for manufacturing the concentrate for preventing or  
treating hypohydration.

ACTIVITY - Antidiarrheic.

MECHANISM OF ACTION - Insulin response modulator.

USE - In the treatment of hypohydration, gut disorder, cystic  
fibrosis, cardiovascular disease and other symptomatically or  
physiologically related disorder, dehydration of a subject (e.g. elderly  
person) who is exposed to a high temperature and/or physical exercise; for  
medical use (all claimed). In the prevention and/or treating the loss of  
bodily water in humans and/or animals, water loss due to excessive  
sweating, water loss due to diarrhea.

ADVANTAGE - (I) has hypotonic osmolarity of at most 300 mOsm/l and  
dry mass content of at most 9 wt.%. (I) has a pH of 2.5 - 6.8 and nitrogen  
content of less than 3 g/l. (I) improves the speed and efficiency of water  
absorption by the body. (I) helps the body to maintain glucose- and  
mineral homeostasis and contributes to the reduction of negative  
side-effects associated with the disturbance in the homeostasis of water,  
minerals, glucose and/or other endogenous compounds. (I) exhibits  
modulating effect on the insulin response thus maintaining the glucose  
balance in the blood plasma. (I) reduces the risk of diarrhea and risk of  
developing muscle cramps.

Dwg.0/0

FS CPI

FA AB; DCN

MC CPI: B04-C02; B04-D01; B05-A01A; B05-A01B; B05-A03A; B05-B02A; B05-C07; B06-A02; B07-A02; B07-B03; B10-A07; B10-A09B; B10-B02D; B10-C02; B10-E04C; **B12-M07**; B14-C03; B14-E10; B14-F01; B14-F02

TECH UPTX: 20021010

TECHNOLOGY FOCUS - ORGANIC CHEMISTRY - Preferred Components: The carbohydrate comprises (g/l) glucose and at least one monosaccharide selected from fructose, galactose (0.5), mannose, ribose (0.5) or inositol (0.5).

Preferred Composition: (I) comprises digestible carbohydrate in a concentration of 10 - 80 g/l and has an average chain length of 3 - 50 monosaccharide units. At least 50% of the carbohydrate is in the form of oligosaccharide or polysaccharide. The amount of fructose and mannose together is 0.05 - 0.6 mole/mole glucose. The **methyamine** is **betaine** and is present in a concentration of 0.1 - 20 g/l.

Preferred Fluid: (I) further comprises (g/l) **glycerol** (0.1 - 20), **lipoic acid** (at least 20 mg/l), vitamin (preferably tocopherol), **citrate**, **phosphate**, **malate**, **taurine** (0.2 - 2) and/or **caffeine** (0.1 - 1) and **methionine**.

TECHNOLOGY FOCUS - BIOLOGY - Preferred Components: The flavanolignan is **silbin** (0.1 - 8 g). The source of **silbin** is **silymarin** (0.2 - 10 g/l).

TECHNOLOGY FOCUS - PHARMACEUTICALS - Preferred Concentrate: The concentrate is in the form of pre-mix, powder, agglomerate, fluid, syrup, gel, tablet or capsule.

TECHNOLOGY FOCUS - INORGANIC CHEMISTRY - Preferred Components: The mineral (0.1 - 30 g/l) is selected from sodium, potassium, chloride, **phosphate**, magnesium (at least 100 mg/l), zinc (at least 10 mg/l), calcium (at least 300 mg/l), iron (at least 5 mg/l) or copper.

ABEX

ADMINISTRATION - (I) is administered orally in the form of water solution, fruit juice, whey dairy drink, beverage or as fluid by tube or enterally. (I) is administered before, during or after the subject is subjected to surgery (all claimed).

EXAMPLE - A drink to support a person suffering from diarrhea was prepared by dissolving glucose (g) (6), ribose (1), inositol (0.2), fructose (2), maltodextrin (5), betaine (2), folic acid (microg), **methionine** (0.3), sodium (2.1), potassium (0.8), chloride (2.9) and **citrate** (1.9) in water (1 liter).

L125 ANSWER 2 OF 3 WPIX (C) 2003 THOMSON DERWENT

AN 2000-331250 [29] WPIX

DNC C2000-100433

TI Serumfree medical solution (I) comprises e.g. an aqueous nutrient and electrolyte solution, a glycosaminoglycan, a deturgescence agent and an energy source, maintains and enhances the preservation of mammalian tissues.

DC A96 B01 B04 B05 D22

IN SKELNIK, D L; SKELNIK, D A

PA (SKEL-I) SKELNIK D L; (BAUL) BAUSCH &amp; LOMB SURGICAL INC

CYC 29

PI EP 1000541 A1 20000517 (200029)\* EN 27p A01N001-02

R: AL AT BE CH CY DE DK ES FI FR GB GR IE IT LI LT LU LV MC MK NL PT  
RO SE SI

AU 9957108 A 20000511 (200031) A01N001-02

CA 2288540 A1 20000505 (200039) EN A01N001-02

JP 2000198701 A 20000718 (200040) 19p A01N001-02  
 US 6153582 A 20001128 (200063) A61K038-00  
 ADT EP 1000541 A1 EP 1999-308702 19991102; AU 9957108 A AU 1999-57108  
 19991028; CA 2288540 A1 CA 1999-2288540 19991103; JP 2000198701 A JP  
 1999-313063 19991102; US 6153582 A US 1998-186580 19981105  
 PRAI US 1998-186580 19981105  
 IC ICM A01N001-02; A61K038-00  
 ICS A61K009-08; **A61K031-70**; C12N005-00  
 AB EP 1000541 A UPAB: 20000617  
 NOVELTY - Serum free medical solution (I) comprises e.g. an aqueous nutrient and electrolyte solution, a glycosaminoglycan, a deturgescents agent, a buffer system, an antioxidant, membrane stabilizing agents, an antibiotic or antimycotic agent, ATP or energy precursors, nutrient cell supplements, coenzymes and enzyme supplements and an energy source.  
 DETAILED DESCRIPTION - Serum free medical solution (I) comprises:  
 (a) an aqueous nutrient and electrolyte solution;  
 (b) a glycosaminoglycan;  
 (c) a deturgescents agent;  
 (d) a energy source;  
 (e) a buffer system;  
 (f) an antioxidant;  
 (g) membrane stabilizing agents;  
 (h) an antibiotic or antimycotic agent;  
 (i) ATP or energy precursors;  
 (j) nutrient cell supplements;  
 (k) coenzymes and enzyme supplements;  
 (l) nucleotide precursors;  
 (m) hormonal supplements;  
 (n) non-essential amino acids;  
 (o) trace minerals and trace elements; and  
 (p) growth factors (animal, animal recombinant, human recombinant or natural).

An INDEPENDENT CLAIM is also included for a method of treating eye tissue for use in eye surgery comprising keeping the tissue in contact with a solution (I) in the period elapsing between removing the tissue from a donor and implanting it into a recipient.

USE - The composition maintains and enhances the preservation of mammalian tissues, preferably mammalian eye tissues, before or after surgery, surgical use of a laser, or degenerative eye conditions (all claimed). In a comparative study of a serum free medical solution and standard MEM 2% FBS medium with human corneas. The results showed that after 14 and 28 days in serum free medium were able to maintain viable corneal endothelium equal in performance to corneas stored in MEM 2% FBS. The serum free medium was effective in maintaining normal corneal cell function and metabolism making it suitable as an organ culture preservation medium.

ADVANTAGE - The solution is serum free. Serum can be an agent for transmission of diseases. In a comparative study of a serum free medical solution and standard MEM 2% FBS medium with human corneas. The results showed that after 14 and 28 days in serum free medium the tissues were able to maintain viable corneal endothelium equal in performance to corneas stored in MEM 2% FBS. The serum free medium was effective in maintaining normal corneal cell function and metabolism making it suitable as an organ culture preservation medium.

Dwg.0/0

FS CPI  
 FA AB; DCN  
 MC CPI: A12-V; B01-C01; B01-C04; B01-C05; B02-A; B02-C; B02-G; B02-K; B02-N;  
 B02-O; B02-P; B02-S; B02-V; B03-A; B03-B; B03-D; B03-E; B03-H;  
 B04-B01B; B04-C01; B04-C02; B04-C03; B04-J01; B04-L01; B04-L02;  
 B04-N01; B04-N02; B05-A03; B05-B01D; B05-B01P; B05-B02C; B05-C01;  
 B05-C02; B05-C05; B05-C07; B05-C08; B07-D03; B07-D04C; B10-A07;  
 B10-B02; B10-B04; B10-C04E; B12-M06; **B12-M07**; B14-N03;

D09-A01

TECH UPTX: 20000617

TECHNOLOGY FOCUS - PHARMACEUTICALS - Preferred Solution: (I) contains components which maintains and enhances the preservation of eye tissues at low to physiological temperatures (2-38degreesC, preferably 16-38degreesC) with a physiological pH. (a) is minimal essential medium (MEM), TC199 medium and a combination of the two. (b) is chondroitin, dermatin, heparin, heparan, or keratan sulfate, or hyaluronic acid in an amount of 0.001 mg/ml-1.0 g/ml. (c) dextran, dextran sulfate, hydroxypropylmethyl cellulose, carboxymethylcellulose, cell gum, sodium alginate, albumin, hydroxyethyl starch, hydroxyethyl cellulose, dextrose, glucose or cyclodextrin in an amount of 0.001 mg-1 g/ml. (d) is glucose, pyruvate, sucrose, fructose or dextrose and (e) is sodium bicarbonate, sodium acetate, sodium **citrate**, sodium **phosphate** or HEPES buffer, both in an amount of 0.1 mM-10 mM. (f) is L-ascorbic acid, 2-mercaptopropanoic acid, glutathione, alpha-tocopherol, alpha-tocopherol acetate, alpha-tocopherol **phosphate** and selenium in an amount of 0.001 microM-10 mM. (g) is vitamin A, vitamin B, retinoic acid, trans-retinoic acid, retinol acetate, ethanolamine, phosphoethanolamine, transferrin, lecithin, B-sitosterol or L-alpha-phosphatidyl choline in an amount of 0.001 mg/ml-500 mg/ml. (h) is gentamycin, kanamycin, neomycin, vancomycin, obramycin, clindamycin, streptomycin, levofloxacin, penicillin, cyclosporin, amphotericin B or nystatin in an amount of 0.001 mg/ml-100 mg/ml. (i) is adenosine, inosine, adenine, flavin adenine dinucleotide, uridine 5'-triphosphate sodium, 5'-methylcytosine, beta-NAD or beta-NADP sodium in an amount of 0.001 mM-10 mM. (j) is alanyl-glutamine, glycyl-glutamine, L-amino-n-butyric acid, L-arginine, D-biotin, **betaine** hydrochloride, D-carnitine, calciferol, carotene; cholesterol, L-cystine, L-cysteine, L-glutamic acid, D-glucosamine, glucuronolactone, L-hydroxyproline, hypoxanthine, L-inositol, glycine, L-ornithine, L-proline, L-serine, myo-inositol, menadione, iacin, nicotinic acid, p-aminobenzoic acid, D-panthothenic acid, pyridoal-5-**phosphate**, pyridoxine hydrochloride, **taurine**, thymidine, xanthine or vitamin B12 in an amount 0.001 microM-10mM. (k) is acetyl coenzyme A, cocarboxylase, coenzyme A, coenzyme Q10 or coenzyme K and (l) is 2'-deoxyadenosine, 2'-deoxycytidine hydrochloride, 2'-deoxyguanosine, 2'-deoxy-D-ribose or ribose, both in an amount of 0.001 microM-10 mM. (m) is beta-estradiol, progesterone, testosterone, cortisol, corticosterone, thyroxine, thyroid stimulating hormone or calcitonin in an amount of 0.001 pg/100 mg/ml. (n) is L-alanine, L-asparagine, L-aspartic acid, L-glutamic acid, glycine, L-proline or L-serine in an amount of 0.001 microg/ml-100 mg/ml. (o) is CuSO<sub>4</sub>.5H<sub>2</sub>O, ZnSO<sub>4</sub>.7H<sub>2</sub>O, sodium selenite, ferric **citrate**, MnSO<sub>4</sub>.H<sub>2</sub>O, Na<sub>2</sub>SiO<sub>3</sub>.9H<sub>2</sub>O, molybdic acid, NH<sub>4</sub>VO<sub>3</sub>, NiSO<sub>4</sub>.6H<sub>2</sub>O, SnCl<sub>2</sub>, AgNO<sub>3</sub>, Ba(C<sub>2</sub>H<sub>3</sub>O<sub>2</sub>)<sub>2</sub>, KBr, CdCl<sub>2</sub>, CoCl<sub>2</sub>, CrCl<sub>3</sub>, NaF, GeO<sub>2</sub>, KL, RbCl or ZrOCl<sub>2</sub>.8H<sub>2</sub>O in an amount of 0.001 pg/ml-0.100 mg/ml. (p) is PDGF-BB, PDGF-AA, nerve growth factor, nerve growth factor-beta, stem cell factor, transforming growth factor-alpha, transforming growth factor-beta, vascular endothelial growth factor, beta-endothelial cell growth factor, epidermal growth factor, epithelial neutrophil activating peptide, heparin binding EGF-like growth factor, fibroblastic growth factor-acidic or basic, IGF-I, IGF-II, keratinocyte growth factor, platelet-derived endothelial cell growth factor, insulin or hepatocyte growth factor in an amount 0.001 pg/ml-0.100 mg/ml.

L125 ANSWER 3 OF 3 WPIX (C) 2003 THOMSON DERWENT

AN 1997-108289 [10] WPIX

DNC C1997-034493

TI New vitamin and mineral compsn. in water soluble dry powder or aq. form - helps in e.g. cell building and cell repair and improve control of e.g. infections, heart disease, cholesterol, physiological stress and hypoglycaemia.

DC B05 D13

IN WILLIAMS, A H; WILLIAMS, E A  
 PA (WILL-I) WILLIAMS A H; (WILL-I) WILLIAMS E A  
 CYC 1  
 PI US 5597585 A 19970128 (199710)\* 5p A61K035-28  
 ADT US 5597585 A US 1995-578284 19951226  
 PRAI US 1995-578284 19951226  
 IC ICM A61K035-28  
 ICS A61K031-07; A61K031-34; A61K031-355; A61K031-70;  
 A61K033-24; A61K033-32; A61K035-26  
 AB US 5597585 A UPAB: 19970307  
 Compsn. of multivitamins and minerals comprises: vitamin A (33000-40000 I.U.); vitamin C (4000-5000 mg); vitamin E (600-650 I.U.); vitamin B1 (20-200 mg); vitamin B2 (10-150 mg); vitamin B6 (30-150 mg); vitamin B12 (30-250 mg); niacin (40-70 mg); niacinamide (20-50 mg); pantothenic acid (20-500 mg); folic acid (0.3-0.6 mg); biotin (30- 100 mg); choline (400-725 mg); inositol (40-100 mg); DL-methionine (160-1000 mg); magnesium (300-420 mg); potassium (100-420 mg); manganese (5-10 mg); zinc (15-30 mg); chromium (130-200 mg); selenium (200-250 mg); betaine (120-130 mg); L-cysteine (660- 1000 mg); thymus concentrate (30-100 mg); and spleen concentrate (30-100 mg). The compsn. opt. comprises 50-100 mg ethylenediamine tetraacetic acid and is pref. in the form of a dry water soluble powder, or in aq. form.  
 USE - The dry compsn. may be dissolved in water to provide a health drink of vitamins and minerals. The aq. compsns. can help in e.g. cell building and cell repair, and improve control of infections, heart disease, cholesterol, physiological stress, hypoglycaemia, adrenal weakness, arthritis, menopause, candidiasis, premenstrual syndrome, hypertension, osteoporosis, anaemia and cataracts.  
 Dwg.0/0  
 FS CPI  
 FA AB; DCN  
 MC CPI: B03-A; B03-B; B03-C; B03-D; B03-E; B03-F; B03-H; B05-A01A; B05-A01B; B05-A03A; B07-D04C; B10-B01B; B10-B02D; B10-B02J; B10-E04C; B14-E11; D03-H01T2

=> d his

(FILE 'HOME' ENTERED AT 12:22:11 ON 10 MAR 2003)  
 SET COST OFF

FILE 'HCAPLUS' ENTERED AT 12:22:26 ON 10 MAR 2003  
 ACT KWON770/A

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L1 (	1) SEA FILE=REGISTRY ABB=ON	PLU=ON	BETAIN/CN
L2 (	3) SEA FILE=REGISTRY ABB=ON	PLU=ON	C5H12NO2/MF AND N N N TRIMETH
L3 (	1) SEA FILE=REGISTRY ABB=ON	PLU=ON	L2 NOT (LABELED OR D/ELS)
L4 (	2) SEA FILE=REGISTRY ABB=ON	PLU=ON	(L1 OR L3)
L5 (	1) SEA FILE=REGISTRY ABB=ON	PLU=ON	SILIBININ/CN
L6 (	7) SEA FILE=REGISTRY ABB=ON	PLU=ON	(SILYMARIN/CN OR "SILYMARIN I
L7 (	6) SEA FILE=REGISTRY ABB=ON	PLU=ON	L6 NOT C4H6O4
L8 (	6) SEA FILE=REGISTRY ABB=ON	PLU=ON	(L5 OR L7)
L9 (	3) SEA FILE=REGISTRY ABB=ON	PLU=ON	(D-GLUCOSE OR L-GLUCOSE OR DL
L10 (	14) SEA FILE=REGISTRY ABB=ON	PLU=ON	(D-FRUCTOSE OR L-FRUCTOSE OR
L11 (	8) SEA FILE=REGISTRY ABB=ON	PLU=ON	(GLYCEROL OR LIPOIC ACID OR C
L12 (	3) SEA FILE=REGISTRY ABB=ON	PLU=ON	(D-METHIONINE OR L-METHIONINE
L13 (	1) SEA FILE=REGISTRY ABB=ON	PLU=ON	TOCOPHEROL/CN
L14 (	1) SEA FILE=REGISTRY ABB=ON	PLU=ON	VITAMIN E/CN
L15 (	9) SEA FILE=REGISTRY ABB=ON	PLU=ON	(SODIUM OR POTASSIUM OR CHLOR
L16 (	2) SEA FILE=REGISTRY ABB=ON	PLU=ON	("SODIUM, ION (NA1+)"/CN OR "
L17 (	2) SEA FILE=REGISTRY ABB=ON	PLU=ON	("POTASSIUM, ION (K1+)"/CN OR
L18 (	4) SEA FILE=REGISTRY ABB=ON	PLU=ON	("CHLORINE, ION (CL1+)"/CN OR
L19 (	2) SEA FILE=REGISTRY ABB=ON	PLU=ON	("PHOSPHORUS, ION (P1+)"/CN O

L20 ( 2) SEA FILE=REGISTRY ABB=ON PLU=ON ("MAGNESIUM, ION (MG1+)" /CN O  
 L21 ( 2) SEA FILE=REGISTRY ABB=ON PLU=ON ("ZINC, ION (ZN1+)" /CN OR "ZI  
 L22 ( 2) SEA FILE=REGISTRY ABB=ON PLU=ON ("CALCIUM, ION (CA1+)" /CN OR  
 L23 ( 2) SEA FILE=REGISTRY ABB=ON PLU=ON ("IRON, ION (FE1+)" /CN OR "IR  
 L24 ( 2) SEA FILE=REGISTRY ABB=ON PLU=ON ("COPPER, ION (CU1+)" /CN OR "  
 L25 ( 4700) SEA FILE=HCAPLUS ABB=ON PLU=ON L4 OR L8  
 L26 ( 637) SEA FILE=HCAPLUS ABB=ON PLU=ON (SILYMARIN/BI OR SILYMARINE/BI  
 L27 ( 0) SEA FILE=HCAPLUS ABB=ON PLU=ON SILY MARIN?  
 L28 ( 15024) SEA FILE=HCAPLUS ABB=ON PLU=ON BETAINE  
 L29 ( 115) SEA FILE=HCAPLUS ABB=ON PLU=ON FLAVONOLIGNAN?  
 L30 ( 42) SEA FILE=HCAPLUS ABB=ON PLU=ON "LIGNANS (L) FLAVONO-" /CT  
 L31 ( 2724) SEA FILE=HCAPLUS ABB=ON PLU=ON LIGNANS+NT/CT  
 L32 ( 320) SEA FILE=HCAPLUS ABB=ON PLU=ON LIGNAN(L) FLAVON?  
 L33 ( 19242) SEA FILE=HCAPLUS ABB=ON PLU=ON (L25 OR L26 OR L27 OR L28 OR L  
 L34 ( 794) SEA FILE=HCAPLUS ABB=ON PLU=ON L33 AND CARBOHYDRATE? /SC, SX, CW  
 L35 ( 316) SEA FILE=HCAPLUS ABB=ON PLU=ON L33 AND (?OLIGOSACCHARIDE? OR  
 L36 ( 399) SEA FILE=HCAPLUS ABB=ON PLU=ON L33 AND ?SACCHARIDE?  
 L37 ( 324) SEA FILE=HCAPLUS ABB=ON PLU=ON L33 AND L9  
 L38 ( 627) SEA FILE=HCAPLUS ABB=ON PLU=ON L33 AND GLUCOSE  
 L39 ( 322) SEA FILE=HCAPLUS ABB=ON PLU=ON L33 AND L10  
 L40 ( 483) SEA FILE=HCAPLUS ABB=ON PLU=ON L33 AND (FRUCTOSE OR GALACTOSE  
 L41 ( 1795) SEA FILE=HCAPLUS ABB=ON PLU=ON (L34 OR L35 OR L36 OR L37 OR L  
 L42 ( 359) SEA FILE=HCAPLUS ABB=ON PLU=ON L41 AND L11  
 L43 ( 90) SEA FILE=HCAPLUS ABB=ON PLU=ON L41 AND L12  
 L44 ( 43) SEA FILE=HCAPLUS ABB=ON PLU=ON L41 AND (L13 OR L14)  
 L45 ( 651) SEA FILE=HCAPLUS ABB=ON PLU=ON L41 AND (GLYCEROL OR GLYCERIN#  
 L46 ( 687) SEA FILE=HCAPLUS ABB=ON PLU=ON (L42 OR L43 OR L44 OR L45)  
 L47 ( 96) SEA FILE=HCAPLUS ABB=ON PLU=ON L46 AND (L15 OR L16 OR L17 OR  
 L48 ( 46) SEA FILE=HCAPLUS ABB=ON PLU=ON L46 AND MINERAL  
 L49 ( 450) SEA FILE=HCAPLUS ABB=ON PLU=ON L46 AND (NA OR K OR CL OR P OR  
 L50 ( 454) SEA FILE=HCAPLUS ABB=ON PLU=ON (L47 OR L48 OR L49)  
 -----  
 L51 ( 30 S L50 AND (DEHYDRAT? OR REHYDRAT? OR HYPOHYDRAT? OR HYDRAT?)  
 L52 ( 12 S L51 AND (FOOD? OR FEED? OR PHARMACEUT? OR PHARMACOL? OR COSME  
     E DEHYDRATION/CT  
 L53 ( 2464 S E19  
     E E19+ALL  
     E E2+ALL  
 L54 ( 1011 S E2+NT  
     E E12+ALL  
 L55 ( 20797 S E2, E3, E1+NT  
 L56 ( 10 S L51 AND L53-L55  
 L57 ( 18 S L52, L56  
     SEL DN AN 1 L57  
 L58 ( 1 S L57 AND E1-E3

FILE 'REGISTRY' ENTERED AT 12:31:21 ON 10 MAR 2003  
 L59 ( 1 S 6915-15-7

FILE 'HCAPLUS' ENTERED AT 12:31:38 ON 10 MAR 2003  
 L60 ( 24 S L50 AND L59  
 L61 ( 22 S L60 NOT L51  
 L62 ( 2 S L60 NOT L61  
 L63 ( 1 S L62 AND REHYDRAT?  
 L64 ( 1 S L58, L63  
 L65 ( 74 S L50 AND (NUTRI? OR FOOD? OR FEED?) /SC, SX, CW  
 L66 ( 1 S L65 AND L53-L55  
 L67 ( 19 S L50 AND (BEVERAG? OR JUICE?)  
     E BEVERAGE/CT  
     E E6+ALL  
 L68 ( 51873 S E2+NT  
 L69 ( 44930 S E82+NT  
     E E82+ALL

E E9 ALL  
 E DAIRY/CT  
 E E12+ALL  
 L70 49688 S E3+NT  
 E FOOD/CT  
 L71 50568 S E3  
 E NUTRITION/CT  
 E E9+ALL  
 L72 78148 S E4, E3+NT  
 L73 309996 S E26+NT OR E28+NT OR E35+NT  
 L74 131 S L50 AND L68-L73  
 L75 160 S L65, L67, L74 NOT L51  
 L76 124 S L75 NOT COSMETIC?/SC  
 L77 35 S L76 AND (ARTHRIT? OR NUTRI? OR DIETARY? OR MEDICINAL OR MATRI  
 SEL' DN AN 2 3 4 5 17 18 19 24 25  
 L78 9 S E1-E27  
 L79 10 S L58, L64, L66, L78 AND L51-L58, L60-L78  
 E VERLAAN G/AU  
 L80 4 S E3, E4  
 E HAGEMAN R/AU  
 L81 33 S E3, E6, E10-E13  
 E SMEETS R/AU  
 L82 23 S E3, E8, E9, E15, E16  
 E LODEWIJK/AU  
 E SMEETS L/AU  
 L83 52 S L80-L82  
 L84 4 S L83 AND L50, L59  
 E NUTRICIA/PA, CS  
 L85 63 S E3-E15  
 L86 63 S NUTRICIA?/PA, CS  
 L87 4 S L85, L86 AND L50, L59  
 L88 11 S L79, L84, L87  
 L89 91 S L83, L85, L86 NOT L88

FILE 'REGISTRY' ENTERED AT 13:02:50 ON 10 MAR 2003  
 L90 25 S (BETAINE OR SILYMARIN?) /CN  
 L91 15 S L90 AND 1/NC  
 L92 1 S C5H12NO2/MF AND N N N TRIMETHYL NOT (LABELED OR D/ELS)

FILE 'HCAPLUS' ENTERED AT 13:03:57 ON 10 MAR 2003  
 L93 16475 S L91 OR L92 OR BETAINE OR SILYMARIN? OR SILIBIN?  
 L94 385 S FLAVONOLIGNAN? OR LIGNAN? (L) FLAVO?  
 L95 16776 S L93, L94  
 L96 670 S L95 AND (?SACCHARIDE? OR CARBOHYDRATE?)

FILE 'REGISTRY' ENTERED AT 13:05:49 ON 10 MAR 2003  
 L97 14 S (GLUCOSE OR FRUCTOSE OR GALACTOSE OR MANNOSE OR RIBOSE OR INO

FILE 'HCAPLUS' ENTERED AT 13:06:17 ON 10 MAR 2003  
 L98 482 S L97 AND L95  
 L99 940 S (?GLUCOSE? OR ?FRUCTOSE? OR ?GALACTOSE? OR ?MANNOSE? OR ?RIBO  
 L100 1431 S L96, L98, L99

FILE 'REGISTRY' ENTERED AT 13:08:42 ON 10 MAR 2003  
 L101 10 S (GLYCEROL OR CAFFEINE OR LIPOIC ACID OR CITRIC ACID OR PHOSPH

FILE 'HCAPLUS' ENTERED AT 13:08:52 ON 10 MAR 2003  
 L102 397 S L101 AND L100  
 L103 540 S L100 AND (GLYCEROL OR GLYCERIN# OR PROPANETRIOL OR CAFFEINE O  
 L104 569 S L102, L103

FILE 'REGISTRY' ENTERED AT 13:10:13 ON 10 MAR 2003  
 L105 1 S VITAMIN "E"/CN

FILE 'HCAPLUS' ENTERED AT 13:10:42 ON 10 MAR 2003

L106 55 S L104 AND (L105 OR VITAMIN "E" OR ?TOCOPHER?)  
L107 569 S L104, L106  
L108 12 S L107 AND L53-L55  
SEL DN AN 1 11  
L109 2 S E1-E6  
L110 12 S L88, L109  
L111 11 S L110 AND (FOOD? OR FEED? OR BEVERAG? OR NUTRI? OR ?DRINK? OR  
L112 1 S L110 NOT L111  
L113 12 S L110-L112  
L114 12 S L113 AND (VITAMIN? OR MINERAL? OR SODIUM OR POTASSIUM OR CHLO

FILE 'HCAPLUS' ENTERED AT 13:14:56 ON 10 MAR 2003

FILE 'WPIX' ENTERED AT 13:15:41 ON 10 MAR 2003

E WO2002058792/PN

L115 1 S E3  
L116 12639 S A61K031-70/IC, ICM, ICS  
L117 47 S L116 AND (?FLAVONOLIGNAN? OR ?FLAVONO?(L)?LIGNAN? OR BETAIN?  
E SILYMARIN/DCN  
E E4+ALL  
L118 15 S E2  
E SILYBIN/DCN  
E E3+ALL  
L119 10 S L116 AND (L118 OR ?SILYMARIN? OR ?SILIBIN? OR ?SILYBIN?)  
L120 50 S L117, L119  
L121 17 S L120 AND (GLYCEROL OR GLYCERIN? OR PROPANETRIOL OR (LIPOIC OR  
L122 3 S R023/M0, M1, M2, M3, M4, M5, M6 AND L121  
L123 14 S L120 AND (B05-A? OR C05-A? OR B05-C? OR C05-C?) /MC  
L124 2 S L120 AND (B12-M07 OR C12-M07) /MC  
L125 3 S L122, L124, L115  
L126 20 S L121, L123 NOT L125

FILE 'WPIX' ENTERED AT 13:27:12 ON 10 MAR 2003